THE RATAN TATA LIBRARY

CI. No XM5:6.73.N5

H9 110 OCT 1956
Date of release for loan

a m

Ac. No.

This book should be returned on or before the date last stamped below. An overdue charge of one anna will be levied for each day the book is kept beyond that date.

				1017
24.x.56%	25.3.57	0		
31 /x/565	- 1 APRY	§57	27	MAY 1874
7/X1/565	- 8 APR 19	7 ,	. "	nfr 1975
16/4/564	17 APR 19	57	29	<u>út1 191 ≅</u>
111-11-1 h	- 4 MAY 195	L		*
	12 DEC 195	 		
5.157.	~ 2 M 196	3		
271157	- 3 JAN"	P68 _		
28 JAN 1957	2 4 JAIL	10	and the second second	
k 4 ft8 195	2			
8 FEB 1957				
5.3.57	_			
Characters in the rate of the control of the contro	against on the state and the state of the st		***************************************	
	•	-		=

CORPORATE FINANCE and REGULATION

By

CHELCIE C. BOSLAND, Ph.D.

PROFESSOR OF ECONOMICS
BROWN UNIVERSITY

Copyright, 1949, by THE RONALD PRESS COMPANY

All Rights Reserved

The text of this publication or any part thereof may not be reproduced in any manner whatsoever without permission in writing from the publisher.

3

To My Mother and Father

PREFACE

The aim of this book is to present a broad and balanced view of the American business corporation as it exists today in an environment strongly colored by government regulation. Approaching the corporation as an organization whose policies and operations reach beyond the private sphere and are of great public concern, this book not only describes the salient features of corporation finance but also includes subject matter drawn from fields that are usually treated in separate college courses, such as government regulation, the trust problem, public utilities, and railroads. Ordinarily a student takes only one or two of these separate courses with the result that there remain wide gaps in his knowledge of some areas of corporate activity.

The author believes that in a one-semester course the student can acquire an intelligent and composite understanding of the financial policies of the modern business corporation and can perceive some of the problems and methods of government control of trusts and "natural monopolies." Of course, completeness and detail must be sacrificed to attain this breadth of scope. But the cost is not too great. Elaborate tables, graphs, classifications, subclassifications, and similar devices may confuse rather than enlighten the student and stimulate temporary memorization rather than understanding. In an effort to stress essential principles such devices have been avoided in this book. Footnotes are reduced to a minimum, and case citations are placed in the body of the text so that the reader's attention is not diverted from the topic under discussion.

This introductory volume does not presume to deal with individual topics as exhaustively as do other textbooks. It is designed, rather, to give the student a sound perspective on corporation finance and government regulation with an economy of time. Major emphasis is placed upon the financial policies

vi PREFACE

of corporations as individual business enterprises engaged in the pursuit of private profit. In the latter part of the book special attention is given to the public's interest in the activities of corporations, with chapters devoted to corporate size and concentration, antitrust policy, and various aspects of public regulation. The concluding chapter deals with recent trends in government control and raises some fundamental questions of policy.

The author wishes to express his appreciation to the publishers and authors who have granted him permission to use materials first appearing elsewhere.

CHELCIE C. BOSLAND

Providence, Rhode Island August, 1949

CONTENTS

CHA	PTER			PAGE
1	Introduction	•	•	3
2	NATURE AND DEVELOPMENT OF THE CORPORATIO	N.		10
3	Noncorporate Forms of Organization			28
4	Organizing the Corporation			38
5	COMMON AND PREFERRED STOCK			51
6	CORPORATE BONDS			86
7,	Promotion and the Financial Plan \checkmark .			116
8 -	Promotional Finance and Overcapitalizatio	n 🗸		141
9 -	Typical Financial Plans for Industrial, 1	PUBL	IC	
	Utility, Railroad, and Financial Corpor.	ATIO:	NS	153
10,	THE SALE OF SECURITIES AND INVESTMENT BA	NKI	NG.	176
11-	THE REGULATION OF SECURITIES AND FINANCE	Ε.		210
12/	Financing Operations 🗸			240
[3,	DIVIDEND POLICY 🗸			265
14,	CORPORATE FAILURE AND REORGANIZATION 🗸	•		290
15,	Corporate Growth and Combination	•		312
16	CORPORATE CONCENTRATION			355
17	THE TRUST PROBLEM	•		377
18	The Regulation of Monopolistic Industrie	s.		416
19	RAILROAD RATE REGULATION	•		447
20	PUBLIC UTILITY RATE REGULATION	•		47 0
21	REGULATORY TRENDS AND PUBLIC POLICY			491
IND	ex			517

CORPORATE FINANCE AND REGULATION

Chapter 1

INTRODUCTION

The Modern Corporation.—The business corporation has become so important in present-day life that it is difficult to conceive of our economic system surviving without it. As a way of organizing and conducting an individual business, the corporation has been one of the building blocks of a free enterprise economic society. Despite its importance—perhaps in a sense because of it—there is a strong tendency to be critical of corporations, particularly big corporations, and the untutored observer might well wonder whether the American business corporation has been the master instrument of civilization or the major cause of our economic, social, and political ills. This controversy is not new. Times of business depression and social unrest have periodically given rise to attacks upon the "interests," the "economic royalists," and "big corporations" by those who hope to gain public support and political office. Yet surprisingly little has been done to inhibit the use of the corporate form of doing business.

Even the most ardent advocates of reform do not seem bent upon the destruction, or even a serious impairment, of its essential qualities. In fact, one of the rather remarkable historical facts is that this flood of criticism has seldom resulted in any appreciable change in the underlying principles of corporate organization, even when the "reformers" have full control of the agencies of government. This is evidence that the corporation is so much part and parcel of a free economy that to place it in a legal strait jacket might do more social harm than good.

In studying the corporation as a form of business organization which raises and administers a sizable part of society's capital, we must be conscious of its social and political implications as well as its bearing on economics and finance. Is popular mistrust of corporations well grounded? Has government defaulted in its duty to protect the public from possible corporate abuses? Are corporate managements arbitrary economic barons, cavalierly playing with the destinies of large and helpless groups of stockholders, laborers, and consumers? Has the modern corporation changed the nature and effectiveness of an economy presumably based upon a large measure of individual initiative and personal freedom? Is corporate concentration reaching dangerous proportions? Are the stockholders, laborers, and the consuming public helpless economic nonentities who require the strong arm of government to protect them. If so, what have we done and how far should we go in the direction of government control?

It is at once obvious that these questions can be answered only against a background of knowledge of the nature and operations of typical business corporations. The purpose of this book is twofold: first, to familiarize the reader with the nature, organization, and financial policies of corporations as individual business entities engaged in the pursuit of private profit; second, to keep constantly in mind other public interests in corporate activity, to examine the need for regulating corporations, and to appraise the methods of regulation which have been adopted or proposed in recent years. These aspects of the subject will be integrated as much as possible as we proceed. It is hoped that an intelligent and composite view of American corporate enterprise as it exists today will result.

Importance of the Corporation.—Almost half a century ago, John P. Davis in his classic history of corporations stated: "The most important and conspicuous feature of the development of society in Europe and America on its formal or institutional side during the past century . . . has been, the growth of corporations." Perhaps it would be even more true today. Some would go so far as to describe our form of economic organization as "corporate capitalism," a not inappropriate term to describe a fair share of our nonagricultural economic life.

¹ John P. Davis, Corporations: Study of Origin and Development (New York: G. P. Putnam's Sons, 1905), p. 1.

5

The careful student or observer, however, will not be misled into thinking that all business concerns are organized and operated as corporations. Far from it! According to the United States Department of Commerce, there were 3,870,000 business concerns in 1947. Of these, probably not more than 550,000, or less than one-sixth, were corporations. The remaining five-sixths were largely individual proprietorships and partnerships. Why then call ours a "corporate capitalism"? Probably because the corporate form predominates in some important areas of economic activity, such as banking, insurance, railway transportation, public utilities, and manufacturing, where simpler forms are inadequate; and also because some corporations are large and wield economic influence far beyond their numbers.

But let us take a closer look at our economy as a whole in an effort to judge the importance of the corporation. A study made by the Twentieth Century Fund, based on data from the United States Census, showed how use of the corporate form in 1929 varied in the different fields of economic activity. At one extreme were agriculture and related industries, in which only 6 per cent of the total income came from corporations; at the other extreme were mining and quarrying, where 96 per cent of the income was attributable to corporations; between these extremes were trade, finance, and the service industries. In manufacturing, only about 48 per cent of all firms were incorporated but these accounted for 92 per cent of the total manufacturing product and employed 90 per cent of all factory workers. Thus the relative importance of the corporation depends upon the measure (number of units, value of products, or number of workers) used to indicate that importance.

Estimates of the share of the total income produced by corporations in 1929 in the different areas of economic life are enlightening. See table at top of following page.²

Since these divisions are not of equal importance, a simple average of the above percentages would be misleading. For example, manufacturing accounts for ten times as much of our national income as do mining and quarrying, and about twice the

² Adapted from Twentieth Century Fund, Big Business, Its Growth and Its Place (New York: Twentieth Century Fund, Inc., 1937), p. 17.

Per Cent of Income

	Produced by
C	Corporations
Agriculture and related industries	6
Construction	33
Miscellaneous	33
Service: professional, amusements, hotels, etc	33
Finance	56
Trade	63
Transportation and public utilities	86
Manufacturing	92
Mining and quarrying	96

income accounted for by trade, or the service industries, or agriculture. In terms of income produced, the study estimated that in 1929 about 57 per cent of our total economic activity was accounted for by incorporated enterprises. Thus it is clear that while the corporate form has been widely used in the United States, other types of ownership units conduct over two-fifths of the nation's business and are about six times as numerous as corporations. The exact number and the breakdown of these other types are not known, but the individual proprietorship unquestionably predominates.

It is of interest to observe that a notable increase in the number of business concerns after World War II took place in such fields as trade, service, and construction, where corporations are of lesser importance. This increase indicates the flexibility and ease with which new enterprises, corporate and noncorporate, can be formed. In some fields, such as retail trade and construction, this postwar increase only restored the number of concerns that existed in 1941, many of which suspended business operations because of war conditions, while in wholesale trade, service, and manufacturing the number of business enterprises in 1946 exceeded the number in 1941. The prewar peak number of business concerns was estimated to be 3,308,000 and the wartime low of 2,835,000 was reached in 1943. By December, 1947, the number of firms was 1,000,000 above the 1943 low.

With wartime losses made good and many new enterprises established by demobilized servicemen and war workers, it can hardly be expected that this postwar rate of growth will continue indefinitely. Perhaps the number of nonagricultural business

enterprises will level off somewhere near the present peak and reach a total of nearly four million.

Size of Corporations.—It is easy to overestimate or underestimate the importance of the corporation. The reason lies partly in the differences in economic significance between large corporations and small ones, and partly in the similarity between small corporations and proprietorships and partnerships. Contrary to general opinion, most corporations are small, being in all respects—except in legal form—essentially devices whereby one person or a few persons can organize business activities which they proceed to manage and promote much as if they were personal business ventures. The "incorporated one-man concern" and the "incorporated partnership" probably represent the vast majority of business corporations, but because of their small size their aggregate importance is far less than their numbers.

This study is primarily concerned with larger corporations, in which many persons, in the hope of making a profit, put their funds at the disposal of a management having power to operate the business. Therefore it may be well at the outset to get some perspective on the relative importance of the small corporation, whose economic impact is much like that of the small noncorporate enterprise, and the large corporation, which is commonly supposed to have colored and molded the shape of our individual enterprise economy. A few figures will suffice.

In 1941 a total of 468,906 active corporations filed federal income tax returns. Of these, 407,053 submitted balance sheets showing total assets of \$340 billion. About 213,000, or one-half of these corporations, reported assets of less than \$50,000, and accounted for only \$4 billion of the total assets. About 335,000, or four-fifths of the corporations, individually had assets of \$250,000 or less, together owned about \$18 billion of assets, and did less than one-fifth of all corporate business.

The relative importance of small and large corporations varies somewhat in different industrial groups, but in every field except finance, corporations with assets of less than \$50,000 comprise one-half or more of the total number. From 75 to 93 per cent of the corporations in various industrial groups have assets of

less than \$250,000. From 90 to 98 per cent of all corporations have less than \$1 million in assets: 8

	Per Cent of		
(Corporations w	ith Assets of	
	Less than	Less than	
Industrial Group	\$250,000	\$1,000,000	
Service	93%	98%	
Trade	91	98	
Construction	90	98	
Agriculture, forestry, etc	85	96	
Public utilities	80	91	
Manufacturing	<i>77</i>	92	
Mining and quarrying	75	91	
Finance	7 5	90	
All corporations	82	94	

At the other extreme, 826 corporations, or about .2 per cent of the total, have assets of \$50 million or more, and account for 56 per cent of all corporate assets and 29 per cent of all corporate receipts. These are the giants of American industry. It is difficult to decide where to draw the line between a large corporation and a small corporation. To some observers a million-dollar corporation is large; to others it is small. Most public questions and many problems of private management and finance are probably most clearly associated with the corporation owning assets upward of \$1 million. Nevertheless, it should be remembered that small corporations, those with assets of less than \$1 million, make up 94 per cent of the number of all corporations, own 12 per cent of total corporate assets, and conduct about 32 per cent of all corporate business.

In discussing the problems of large corporations there is always the danger of drifting into the belief that the entire economy is composed of and managed by these large entities. Political discussions of these matters have been heated and are frequently designed to confuse the average citizen who is not armed with the facts about American business enterprise. It is well to remember that about two-fifths of all economic activity is carried on by unincorporated enterprises and an additional two-fifths by small and medium-sized corporations. The giants represent the

⁸ Statistical Abstract of the United States, 1944-45, p. 299, is the source of the basic data.

remaining one-fifth. The implications of the giant corporation and the concentration of economic power will be discussed later, after we have explored more fully the nature, organization, and financial policies of the corporations.

REFERENCES FOR FURTHER READING

- Berle, A. A., Jr., and Means, G. C. The Modern Corporation and Private Property. (New York: The Macmillan Co., 1933), Chs. 1-3.
- National Association of Manufacturers. The American Individual Enterprise System. (New York: McGraw-Hill Book Co., Inc., 1947), Ch. 2.
- Temporary National Economic Committee, Monograph No. 15. Financial Characteristics of American Manufacturing Corporations. (Washington, 1941).
- Twentieth Century Fund. Big Business, Its Growth and Its Place. (New York: Twentieth Century Fund, Inc., 1936), Chs. 1-3.

Chapter 2

NATURE AND DEVELOPMENT OF THE CORPORATION

Although there is considerable disagreement among legal authorities as to the exact nature of the corporation, the definition most frequently encountered is that given by Chief Justice Marshall in the famous Dartmouth College case in 1819:

A corporation is an artificial being, invisible, intangible, and existing only in contemplation of law. Being a creature of law, it possesses only those properties which the charter of its creation confers upon it, either expressly or as incidental to its very existence.¹

This definition implies that the essential characteristics of the corporation are: (1) that it is a legal entity separate and distinct from the natural persons who at any particular moment compose it; (2) that it is created by the act of a sovereign state; and (3) that its powers are determined by the state and are specifically designated or implied in the corporate charter. This is commonly called the *fiction theory* of the corporation. It not only suggests the complete separateness of the corporation from its members, but also makes a grant of power by a sovereign government an absolute prerequisite to its existence.

The Fiction Theory.—This fiction, or sovereignty, theory has been vigorously disputed by legal students of the corporation, but we will not attempt to trace their involved legal reasoning. It is sufficient to point out that critics attack the fiction idea on grounds of both history and logic.

Historically the corporation is traced back to associations of individuals brought together for a common purpose, without any official act on the part of the state. Berle says:

Dartmouth College v. Woodward, 4 Wheaton 518 (1819).

There seem to have been corporations under the late Roman Republic. They were not made by the state, and the state had nothing to do with them. They were called "universities" (Universitates) and their members were called "associates"; they could sue and be sued in a common name. They held property in their own name in which associates had no individual interest. They could adopt by-laws. They acted through agents who were chosen by a majority vote. They apparently achieved limited liability, since the property of the university was liable for its debts, but the property of the associates could not be reached.²

This suggests that from its earliest days the corporation was essentially an association of individuals, formed by mutual agreement or by a contract which determined the rights, duties, and powers of the members, and that its features were those of the modern business corporation: (1) limited liability; (2) delegated and centralized authority; and (3) continuing existence.

Even in ancient Rome the sovereign was not entirely unmindful of these "self-made" corporations. Since they might grow so strong as to be a threat to the throne, they were required to register or to obtain a permit. But permission was not creation, and the two must not be confused.

The Contract Theory.—The doctrine of state creation, whether it is historically sound or not, seems to have played a large part in Anglo-Saxon legal tradition. On the other hand, Continental Europe, which followed more closely the Roman code, has long recognized that the essence of a corporate body is an association of individuals founded by mutual agreement. Under the Code Napoléon this agreement had to be in writing and filed with proper authorities for public inspection. Thus there has grown up the competing notion that a corporation is an association of individuals held together by a common purpose and mutual agreement. The act of incorporation is merely a recognition by the state of this simple and all-important fact. According to this theory, the essential characteristic of the corporate agreement, or charter, is not a concession or grant of

² A. A. Berle, Jr., Studies in the Law of Corporation Finance (Chicago: Callaghan & Co., 1928), p. 3.

authority by the state, but a recognition by the state of an association of individuals whose objectives, rights, and duties are defined by the terms of the charter. This charter establishes a relationship among three entities: the corporation, the associates, and the state. This has been called the *real theory* or the contract theory of the corporation.

The controversy need not detain us long. Technical legal theories are important here only in so far as they help us to understand the business corporation as it exists today. The fact is that both the fiction theory and the real or contract theory have considerable legal recognition and pragmatic validity. Moreover, the ideas are not mutually exclusive. In the Dartmouth College case, John Marshall ruled that the college charter was not only a grant from the British crown but a contract between the crown and the corporation, and that the contract was binding even upon the state of New Hampshire which was not an immediate party to the agreement, but the successor to the authority of the crown after the Revolution. The doctrine that a corporate charter is a contract dates from this decision in 1819.

A look at the present-day process of incorporation also lends support to the notion that if incorporation is a grant from the sovereign, such concessions are made almost cavalierly, with nothing more required than a clerk's perfunctory inspection of a document prepared by the incorporators, whose objective is to insert in the agreement provisions which are conducive to their own interests. To be sure, the incorporators must conform to the requirements and restrictions laid down by general incorporation laws; but as we shall see, these laws usually afford them ample scope.

Attitude of the Courts Toward the Corporate Entity.—Another line of evidence that the fiction theory is inadequate as a working legal hypothesis is to be found in court decisions where, to achieve justice, the legal fiction has been brushed aside. It is a well-established rule of law that the corporation will not be treated as a separate entity when men use it to commit fraud or violate the law. Courts do not hesitate to "pierce the veil"

of the corporate fiction to get at the individuals whose actions are at issue.

For example, courts have held that a corporation cannot collect insurance on a building set on fire by a controlling stockholder, for obviously this would permit the corporate entity to be used to perpetrate fraud. Similarly, courts have held that the creation of subsidiary companies by parent companies to escape their obligations or to evade the law is ineffective. Courts have also held that corporations are not separate and distinct from their stockholders but can be held responsible for their stockholders' actions. In a well-known case, a New York court in 1890 ordered the North River Sugar Refining Company to forfeit its charter and dissolve because the stockholders had voted to join the Sugar Trust, thus exceeding the powers granted in the corporate charter, although the corporation itself had taken no action whatever in the matter. Two years later the Supreme Court of Ohio rendered a similar decision, declaring that action by the stockholders of the Standard Oil Company of Ohio in joining the Standard Oil Trust tended to create a monopoly contrary to public policy and was therefore void. Forfeiture of the charter was not required in this case, but the trust was dissolved.

In ordinary business procedures, it has been held that there is substantial identity between a corporation and its wholly owned subsidiary, so that in some instances service of legal process on a subsidiary located within the state can be considered a valid action against its parent incorporated outside the state. Similarly, it has been held that a holding company which lends money to its subsidiary does not have the status of a creditor and cannot share as a creditor in the assets of its subsidiary.

Only recently the United States Supreme Court, in a five-to-four decision, swept aside the legal fiction in the case of a defunct corporation that had been organized in Kentucky to control commercial banks by stock ownership. Bank stocks were generally subject to double liability prior to 1935. (The national bank in question failed in 1930.) The holding company stock under the laws of Kentucky had no such double liability. Yet in the majority opinion written by Justice Douglas, the court ruled

that stockholders of the holding company were essentially the beneficiaries and owners of the national bank stocks held by the company and therefore were doubly liable for the debts of the national banks. The holding company might as well not have existed as far as the protection it afforded its stockholders was concerned. The minority of the court, speaking through Justice Jackson, objected strenuously to this interpretation and accused the majority of "legislating" liability where none existed.

Even in England, where the notion of the corporate fiction is most firmly imbedded, as a result of a legal tradition running back to James I and his attorney general, Lord Coke, the House of Lords in 1916 declared that a corporation, although chartered in England, was essentially alien because its owners were wartime alien enemies, and therefore its property could be confiscated as if it had been owned by the enemy aliens themselves.

Then, too, courts have sometimes found it convenient to recognize a corporate body, even where there has been no act of incorporation and no charter has been granted. The classic instance is a Supreme Court decision ruling that a labor union which had never filed a certificate of incorporation was a unity in fact. The court permitted a suit to be brought against the union as an entity. This recognition of a de facto corporation at least modifies the notion that a grant by a sovereign authority is the essence of the corporate nature.

On the other hand, it would be folly to suggest that courts disregard or uphold the corporate fiction whenever it seems to suit their needs or prejudices. In many cases courts have upheld the corporate entity as separate and distinct from its owners even when the owners in question held 100 per cent of the stock. Even where two or more corporations have largely the same stockholders and officers, each may be treated as a separate corporate entity. Courts have consistently held that corporations owned by government are separate entities and not mere government divisions. They have also held that a corporation owned by Negroes was not barred from acquiring title to land transferred with the clause that it could not be owned by a Negro. (This was before a 1948 Supreme Court decision making such restrictive covenants invalid.)

Where lawyers disagree, it can hardly be expected that the layman is qualified to solve the problem of the corporate fiction. Court rulings have been so voluminous that decisions have gone both ways on substantially the same facts. Perhaps the simplest thread of reality and logic that runs through the conflicting opinions is that the corporate fiction will be upheld unless it can be clearly shown that the corporation was not organized or operated for a legitimate purpose. If used to violate the law, commit fraudulent acts, obtain unfair advantage, violate private agreements, act as a mere instrumentality of another corporation, prevent justice, or act contrary to public policy, the corporate entity is likely to be disregarded.³

Nature of the Modern Corporation.—And so we are left without an unassailable definition of the corporation, knowing only that a simple definition may be misleading. Perhaps the attributes of the corporation described by J. P. Davis provide the best clue to its true nature.4 He defines a corporation as an association, organized by the volition of individuals, whose relationships are prescribed by contract and whose power to act is granted by the state. Within the limits of its charter and the laws of the state, it is self-governing and has a continuous existence. Although composed of many individuals it acts as a unit through delegated management. Historically, it was presumed to justify its existence by promoting the public welfare, even though organized primarily for private gain. If we add to these the final attribute which has not always been essential to corporate existence but which, perhaps more than any other factor, accounts for the popularity of the corporate form today, namely, limited liability of stockholders and management for the debts of the corporation, we have at least a working description of the corporation.

B See W. H. Anderson, Limitations of Corporate Entity (St. Louis: Thomas Law Book Co., 1931); Berle, op. cit., pp. 1-25; R. N. Owens, Business Organization and Combination, 3rd ed. (New York: Prentice-Hall, Inc., 1946) pp. 115-120; W. Z. Ripley, Trusts, Pools and Corporations (Boston: Ginn & Co., 1916), pp. 466-470; H. R. Seager and C. A. Gulick, Jr., Trust and Corporation Problems (New York: Harper & Bros., 1929), pp. 49-55.

⁴J. P. Davis, Corporations: Study of Origin and Development (New York: G. P. Putnam's Sons, 1905), pp. 15 ff.

Haney summarizes Davis' description in the following definition which, except for the omission of limited liability, probably would be acceptable and adequate: "A corporation is a voluntary autonomous association formed for the private advantage of its members, which acts with compulsory unity, and is authorized by the state for the accomplishment of some public good." ⁵

Dewing suggests that from a legal point of view a corporation is an entity arising out of a common purpose and coming into existence by a grant from a sovereign power. It is the focal center of a group of contracts between the sovereign, the members, and their corporation. It has a continuing life, independent of that of any human being. But he hastens to criticize legalistic definitions and the overemphasis on the corporation as an entity detached from everyday realities. To him the essential characteristic of the corporation is its "pragmatic reality." It was created by man to meet an economic need, and its greatest contribution is its capacity to maintain the integrity of a fund of property dedicated to a single purpose.

It would indeed be much simpler if the student of corporations could disregard all legalistic notions about the corporation, but that, too, would be unrealistic. Presently we shall see that fundamental legal principles have a very important bearing upon the organization, operation, and dissolution of corporations; but emphasis should be upon its economic rather than its legal aspects.

Development of the Corporation.—Definitions sometimes confuse more than enlighten. They may be artificial and unrealistic. History may afford a better clue to the nature and importance of the corporation with its rich and varied background, and the many forms it has assumed in meeting men's needs—social and private—over the centuries.

Ancient civilizations were not strangers to the idea that several individuals could organize a group and pool their resources for the accomplishment of a specific purpose. The introduction

⁵ Lewis H. Haney, Business Organization and Combination (New York: The Macmillan Co., 1922), p. 82.
⁶ Arthur S. Dewing, The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Vol. I, pp. 3-22.

of coined money as a means of payment facilitated trade and encouraged the organization of joint undertakings in which riches and gains were shared by many. Florence and Genoa in the fourteenth and fifteenth centuries were probably the homes of many trading and mining syndicates which had some of the characteristics of the modern business corporation, and as early as the twelfth century religious groups, municipalities, colleges, and guilds had well-recognized characteristics as corporate bodies.

The latter organizations were in a sense similar to earlier Roman institutions to which the origin of the corporate idea is usually attributed. We have already seen how the early "universities" of Rome were organized, without the aid of the sovereign, as continuous entities capable of owning property, suing and being sued, and transacting business through their duly elected agents. Apparently they even achieved limited liability. With the growth of the Christian Church and the religious societies to which it gave rise there began a tradition that was to carry the notion of corporations down through the centuries. Churches, monasteries, convents, colleges, and religious societies were all entities whose purposes and functions were continuous regardless of the individuals who might temporarily be their members. To conduct their affairs they had to own property, receive and spend money, delegate tasks of management, and lay plans for a future transcending the mortal existence of their members. In this capacity to pursue a common objective through unified action, perpetual succession, and centralized supervision are found some of the salient characteristics of the corporation.

Early British Nonbusiness Corporations.—Historians disagree on how the idea spread from Rome to the rest of the world. Perhaps, as some suggest, the Church and its missionaries took Roman ideas and institutions to the far reaches of the Continent. At the same time, commercial travel and military expeditions familiarized the Continent with associations of individuals engaged in joint commercial undertakings. However, there is no agreement as to whether these survived the Dark Ages or

whether they secured a firm foothold in England from whence the corporate idea came to us. There is apparently considerable reason to believe that the British antecedents of the modern business corporation arose in response to local conditions and do not trace their lineage back to Rome. These antecedents were of several kinds.

Perhaps the most important were the towns, which succeeded in extricating themselves from the feudal system and acquiring a more or less autonomous existence. They were given powers by the sovereign in return for money or service. These included the right to buy and sell, to be exempt from tolls and fees, to segregate and own land, to establish courts and legislative bodies, and to tax. Thus the town was essentially a group of individual persons organized to pursue their common interests which were partly governmental. The charter it received merely recognized its existence.

Closely allied with the towns were the guilds, particularly the merchant and the craft guilds. These appeared at the end of the eleventh century and were organized within the towns to promote the economic interests of the members. They regulated trade and methods of manufacture in great detail and frequently set the prices of goods and wages. Usually they held charters from the crown. They governed by consent of the members, but as time went on they became less and less democratic. Although they were interested in advancing the welfare of their group, they did not engage in profit-making industry as such. Their primary purpose was semigovernmental and regulative. Each individual depended upon his own efforts for a livelihood. By the sixteenth century their economic power had been pretty well broken and the remnants of their prerogatives were exercised by the Livery Companies which were largely political rather than economic.

The corporate idea was also continued by the Church and the educational institutions it founded (universities at Paris, Oxford, and Cambridge). These organizations owned property and came to be recognized as entities having a continuous existence and the capacity to conduct their affairs without outside interference.

Regulated Companies.—Out of these nonbusiness corporations, as if by gradual evolution to meet the changing needs of industry and trade, came the immediate forebears of the modern business corporation. Perhaps the first step was the organization of regulated companies, which somewhat resembled the earlier guilds, shorn of their social and charitable functions.

They were organized by merchants, usually engaged in foreign trade. They were chartered by the king, who found in them a device for regulating trade and collecting customs. The members, called "staplers," were regulated in their trading, but in turn were given monopoly privileges in certain areas. Outsiders sometimes engaged in trade by the payment of a fee for the privilege. These companies, which were important in the sixteenth and seventeenth centuries, did not trade; instead, each individual member traded on his own account. Thus the regulated company represented more a monopoly grant to a group of individual traders operating under a set of restrictive rules than it did a joint venture, which is characteristic of the joint stock company. The Society of Merchant Adventurers, chartered in 1505, was an outstanding example of the regulated company. It succeeded in regaining trade privileges in England previously granted to Hanseatic (German) traders by the crown.

Joint Stock Companies.—The joint stock company was a private company, frequently with monopoly privileges and sometimes with the power to govern, which was organized for the profit of those putting up the capital. The capital was obtained by the issuance of joint stock; it is this feature which gave the organization its name and the claim of being, if not the father, at least the grandfather, of the modern business corporation. The capital was divided into shares which were sold to those wishing to participate in a particular venture in the hope of gain. At first this meant a particular voyage after which the gains would be divided and the original capital repaid. Later the capital was looked upon as a permanent fund to be used continuously. Thus, as was common at the time, the African Adventurers, chartered in 1553, with a capital of £5,000 was re-

shuffled after every voyage, through the issuance of first joint stock, second joint stock, and so forth.

Most early joint stock companies in England seemed to be chartered for the purpose of engaging in foreign trade. Among them was the Russian Company chartered in 1553 with a capital of £6,000 payable by calls of £25 on each share. The Levant Company, organized in 1581 to trade in Turkey, was granted a permanent charter in 1605. It was a giant company for its day with a capital of £80,000, one-half of which was loaned by Queen Elizabeth.

There were also a few early instances of the use of joint stock in home trade and industry. Cases in point are the Merchant Adventurers of Newcastle-upon-Tyne (1554); the Mines Royal Society, organized between 1560 and 1570 with exclusive rights to mine precious metals in parts of England and Wales; and the Society of Mineral and Battery Works (1568). Decades later the joint stock company was widely used by private business to organize water supply systems, banks, insurance companies, and manufacturing concerns.

Joint Stock Companies for Colonization.—One of the most interesting and spectacular uses of the joint stock company during the seventeenth and early eighteenth centuries was to promote trade and establish colonies in new and old areas of the world. These companies deserve brief consideration for the important part they have played in history, particularly American history.

The East India Company is the classic example of this type of quasi-private corporation. It governed India until 1781 and had a virtual monopoly of the Indian trade until 1823. Organized in 1600 with a capital of £30,000, it issued its first joint stock in 1612. (Its powers of government need not concern us here. Its rule of India is well known.) Because of its close relationship to the crown and its political duties it had a cumbersome management, consisting of a governor, a deputy and twenty-four assistants, to say nothing of ten auditors. Nevertheless, it prospered—in some years its earnings were 200 per cent of its investment—and by 1620 it had 1,000 shareholders

holding its joint stock of £1,629,000. Its prosperity invited competition at first by the Dutch East India Company, and later by a competing English company chartered by Charles I, reflecting the political struggle at home. Severe competition and losses to both companies led to their union in 1646. The company alternated between complete monopoly and competition as political developments and the state of the royal treasury made expedient. In 1662 it was given the privilege of limited liability.

It is well known that early joint stock companies undertook the first colonization projects in America, although most of them were not conspicuous for their financial success. In 1606 the London Company and the Plymouth Company were organized to colonize Virginia. They had broad governmental powers and appealed to those who put up the money (adventurers) largely because of the great riches in land and precious metals that were expected. The work of colonization was left to the planters who went to the colonies to improve their lot or to achieve religious and personal freedom. The Massachusetts Bay Company, organized in 1628, had a similar objective and career. Hundreds of thousands of pounds were lost in these unsuccessful ventures, and the commercial side of their activities waned while the political and successful side became of predominant importance. To indicate the contribution that this type of organization has made to American history, one needs only to add that the Dutch West India Company founded New Amsterdam and that a Swedish trading company settled Delaware.

Speculation in Joint Stock Companies.—By 1700 the joint stock device was well established and the success of the early companies invited many imitators. We need not pause to delineate in detail the development of the joint stock or corporate idea after 1700. To meet the needs of expanding industry and trade, new companies came into existence, and the promotion and sale of stock became a major occupation of imaginative and unscrupulous minds. "Stockjobbing" came to cast suspicion on all projects financed by the sale of transferable shares. The most famous of these schemes was the South Sea Company, organized in 1711, to pay off the burdensome government debt through the

sale of company stock. In return the company received a monopoly of trading rights in the Pacific.

The Mississippi Scheme, a similar plan conceived by John Law for converting the national debt of France through the promotion of a company having a monopoly of foreign trade, fed the speculative fever in both countries. South Sea stock rose in six months from £126 to £1,000 per share. Additional shares were sold and new ventures were formed, with or without a charter from the state, as the paper profits of stock ownership soared. But when this speculative fever could no longer feed upon itself, prices began to slump, and in September, 1720, the world beheld its first international stock market panic, followed by widespread failure and liquidation. The South Sea Company failed in 1721 and went through a drastic capital readjustment, never again to attain a place of prominence.

Perhaps the prevalent modern tendency of the public to take at least a quizzical attitude toward corporations may have its remote historical roots in this earlier period, for these joint stock companies are associated in the public mind with a royal grant of privilege, monopoly of economic and sometimes political power, and the sale of worthless stock. At least these may have been reasons why the Founding Fathers refused to give the newly organized federal government the power to grant corporate charters.

In England the Bubble Act of 1720 was passed to prevent the easy organization of joint stock companies and to make it unlawful for persons to act as a corporate body or transfer shares without legal authority. While the act was of questionable effectiveness, since the greatest offenders had been the legally organized companies which supported this ban on new enterprises, it did stop the organization of new joint stock companies and for many years it was to cast a cloud of legal doubt on many of them.

With the new inventions and technical developments that we now associate with the Industrial Revolution there was need for larger and larger investments of capital and the business unit grew in size beyond the limits of workable partnerships. By the end of the eighteenth century many new quasi-public ventures, particularly canal companies, had been chartered, but apparently it was difficult to obtain charters for purely private business ventures, such as insurance and manufacturing. Necessity promoted the use of substitutes for the corporation, such as the share-issuing *voluntary associations*, which were of questionable legal standing. Many were dissolved for fear of prosecution under the Bubble Act of 1720.

This was a period in which individualism was the central theme of the times. "Laissez faire" meant not only freedom from the restrictions of a government motivated by mercantilistic notions, but freedom from monopolistic privileges and from the inherent inefficiencies which were thought to be the inevitable results of large aggregations of capital managed by corporations. Adam Smith would have restricted the corporate form to enterprises with large capital needs having an unusual degree of public significance.

But events were moving in the opposite direction. It soon became evident that industry and trade could be more effectively promoted by a form of business organization designed to collect large amounts of capital from many individuals who were not in a position to participate in management. Time and growing democracy lessened in the public mind the association of the corporate charter with royal privilege and monopoly. Despite recurrent booms and slumps, many chartered companies advanced in prestige.

In 1825 the Bubble Act was repealed. But the struggle for easy and routine incorporation of British companies was not at an end. Ever since 1688, when the right of the crown to grant power to monopolists was curbed, the ultimate responsibility for incorporation had shifted toward Parliament, and that body issued many charters under special acts. Only after investigation of the problem of incorporation by a parliamentary committee, appointed in 1841, was a general enabling act providing for incorporation by registration passed in 1844. This act laid the foundation for the general incorporation and regulation of British companies, and many of its major provisions are

still intact today. In 1855, after much controversy, limited liability was given to all registered companies.7

Incorporation in the United States.—In the United States corporate developments took a somewhat different course. During the colonial period, American and British experience ran parallel, if for no other reason than the dominance of the crown over the affairs of many of the colonies. In most cases the power to grant corporate charters was assumed by the governors and the assemblies, and even by local governments in charter colonies. But business corporations were created sparingly; the predominant grants were those made to religious or municipal bodies. Either because business units were usually small or because corporations were mistrusted, and possibly because the Bubble Act was made applicable to the colonies, purely business corporations were few and far between. Even most of these were of a quasipublic nature, as the names of the six corporations organized by the colonial governments before 1789 reveal: 8

The New York Company for Settling a Fishery in These Parts	
The Free Society of Traders in Pennsylvania	1682
The New London Society United for Trade and Commerce in	
Connecticut	1732
The Union Wharf Company of New Haven	1760
The Philadelphia Contributorship for Insuring of Houses from Loss	
by Fire	1768
The Proprietors of Boston Pier or Long Wharf, in the Town of Boston	
in New England	1772

Apparently few corporations were created during the Revolution, but thereafter new incorporations occurred frequently. The Bank of North America was the first wholly American corporation, receiving its charter from Congress in 1781.

The new sovereign states, exercising their freedom from restraint, seemed ready to grant corporation privileges to business concerns, particularly to those contributing to internal development, such as canal, turnpike, water supply, and wharf companies, and to banking and insurance institutions. It is estimated that

⁷ For an excellent study of British corporation history, see B. C. Hunt, The Development of the Business Corporation in England, 1800-1867 (Cambridge: Harvard University Press, 1936).

⁸ S. E. Baldwin, American Business Corporations Before 1789 (American Historical Association, 1902), Vol. I, p. 257.

by 1800 some 200 companies had been chartered. There was little uniformity in charter provisions as among the different states or even within a particular state, and the process of trial and error prevailed. Each charter required a special legislative act, and the provisions and powers granted might be whatever could be pushed through an indifferent and sometimes corrupt legislature. Incorporation was not a right but a privilege to be bestowed at the pleasure of the state for whatever purpose and to whomever the legislature pleased. For better or worse, uniformity through federal incorporation was deliberately avoided. Because of the fear of monopoly and centralized power the United States took the first steps along the path still followed today: diversity, ease of incorporation, and competitive laxity under the laws of the several states.

General Incorporation Laws.—As greater experience was gained, there was a tendency for particular state legislatures to prescribe more or less standardized provisions in charters of incorporation of concerns engaged in the same industry, e.g., manufacturing, banking, and insurance. At the same time it became apparent that there were grave defects in the method of issuing charters by legislative act. The flood of bills granting charters made it necessary for legislators to devote a large part of their time to scrutiny of requested charters, or, as was probably more frequently the case, such bills received only perfunctory notice or none at all. This placed political pressure and even corruption at a premium, and charter granting frequently disregarded the public interest. Moreover, special privilege was criticized, as it was argued that each citizen or group of citizens was entitled to adopt the corporate form.

In 1795 North Carolina passed a general enabling act under which any group meeting the uniform requirements laid down by law could organize a canal company. In 1799 Massachusetts did the same for water supply companies. In 1811 New York adopted what is usually regarded as the first general enabling act for manufacturing. In 1837 Connecticut passed what is now considered the first thoroughly modern incorporation law. At first other states were slow to follow, but by 1850 most of them

had general enabling acts. Today all states have such acts, and all but five (Massachusetts, Connecticut, Rhode Island, New Hampshire, and Vermont) have constitutional provisions barring special incorporation of general business concerns.

Incorporation is no longer a matter of special privilege but a right that can be exercised by everyone who is willing and able to follow a few simple rules and pay a modest fee to the state. Instead of being a grant by a sovereign government of special concessions to accomplish some public purpose, incorporation has become a routine process, with no state official higher than a clerk checking on the articles of incorporation drawn up and filed by the incorporators or their attorneys, who have "written their own ticket" within the framework of liberal general enabling statutes.⁹

Finally, most states have special statutes governing cooperative associations

PIt must not be assumed that all corporations are private business organizations. A moment's reflection will bring to mind many kinds of groups that have a corporate existence. For example, there are many nonstock private corporations organized to carry on the purposes of their founders over a period of years. This frequently involves the ownership of property, the receipt, expenditure, and borrowing of money, etc. Such groups as schools, colleges, churches, hospitals, clubs, fraternities, lodges, and charitable organizations commonly exist and operate under charters issued by the state governments (as a more or less routine matter) for a nominal fee. Many of our oldest private schools have existed as corporate entities; some own millions of dollars' worth of property and are managed according to rules laid down in the charter by officers appointed by a board of directors, or trustees, or a similar body. They differ from private business corporations largely in their

objective; they do not seek profits for their members.

Public or governmental corporations comprise another class. They are of two types: (1) municipal corporations, such as towns, counties, cities, townships; and (2) government-owned corporations, such as the Panama Railroad Company, the Export-Import Bank, the Reconstruction Finance Corporation, and some 43 other federal corporations. Government-owned corporations were a comparative rarity until World War I, when such war agencies as the War Finance Corporation, the U.S. Shipping Board, the Emergency Fleet Corporation, and the U.S. Housing Corporation were created. These were liquidated after the war and only one or two government corporations, such as the Inland Waterways Corporation, were organized from then until 1931. With the advent of the severe business depression and the New Deal (and the later emergencies of World War II), new corporations were created in profusion. Some of the 46 corporations existing in 1944 have reached massive size; 7 had assets of \$1 million or more; and all 46 had assets totaling nearly \$30 billion. These corporations have charters, and are authorized to issue stocks and, in some cases, bonds. The United States government owned \$6 billion of such stock in 1947. These corporations have had an independence and financial autonomy far greater than a government department, especially before 1945, when they were brought under some control by Congress.

REFERENCES FOR FURTHER READING

- Berle, A. A., Jr. Studies in the Law of Corporation Finance. (Chicago: Callaghan & Co., 1928), Ch. 1.
- Buchanan, N. S. The Economics of Corporate Enterprise. (New York: Henry Holt & Co., 1940), Ch. 3.
- Davis, J. P. Corporations: Study of Origin and Development. (New York: G. P. Putnam's Sons, 1905).
- Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book I, Chs. 1, 2.
- Hunt, B. C. The Development of the Business Corporation in England, 1800-1867. (Cambridge: Harvard University Press, 1936).
- Ripley, Percy. A Short History of Investment. (New York: Pitman, 1934). Seager, H. R., and Gulick, C. A., Jr. Trust and Corporation Problems. (New York: Harper & Bros., 1929).

and mutual companies, organized with or without capital stock, but for the definite purpose of promoting their members' economic interests: saving money on purchases, getting higher prices for sales, sharing profits, etc. Farm marketing and purchasing cooperatives, consumers' cooperatives, mutual insurance companies, building and loan associations, and cooperative banks are leading examples. Ordinarily these are easy and inexpensive to organize and are sometimes given special privileges such as tax exemption. These special privileges incite considerable controversy, especially when such organizations compete directly with private concerns paying large taxes.

Chapter 3

NONCORPORATE FORMS OF ORGANIZATION

Proprietorship.—We have seen that less than one-fifth of our business units are corporate in form, but that in some fields—public utilities, mining, and manufacturing—they account for a large proportion of the business activity. It is clear that the great majority of nearly four million business units, to say nothing of six million farmers, have in practice preferred noncorporate forms, despite the ease and cheapness of incorporation. Although accurate information is lacking, there is no doubt that the vast majority of businesses have taken the single proprietorship form.

The person who goes into business for himself and puts up all or most of the capital, without having others share in the management of the business or in the profits, operates as a single proprietorship. This is the oldest type of business unit, and has so many advantages that it has survived the creation of other forms and even now outnumbers all other types.

The advantages of the single proprietorship to the enterpriser are clear.) It is easy to start anywhere in the United States, for under our Constitution no state can deprive the citizen of any other state of the privileges it gives its own citizens. Thus, a natural person may seek opportunities in any state, regardless of where he resides. (Corporations do not have this freedom as a matter of constitutional right, since they are not citizens.) He may move freely from state to state. He can make quick decisions, and need not consult anyone or receive anyone's consent. Since he alone receives the profits or suffers the losses, he has every incentive to work hard and long, reduce waste, and adopt the best possible methods. There is a direct relationship between his industry, inventiveness, and acumen and his rewards. Risk and responsibility are securely welded to-

gether. If there be business or technical secrets, he need bare them to no one. Since he has asked no special privilege of the state, he is not subject to its special inquisitive or visitorial powers. Since he is liable to his creditors to the full extent of his personal fortune, his credit standing is better than if he attempted to limit his liability. If, as is usual, he must hire others to work for him, they have only those powers to act for him and bind him that he has specifically delegated to them as his agents. He need not risk his entire personal fortune on the action of his partners. He pays only those taxes that are levied on him as an individual. He is not subject to the burdens of double taxation on business profits, as is the corporation, which pays a federal tax on its income and whose stockholders must pay the full personal income tax on the same income when it is distributed as dividends. However, he pays the personal income tax on all his earnings, whether he draws them out or leaves them in the business.

But the proprietorship has handicaps that can be overcome only by organizing the business unit in a different form. Chief among the disadvantages are the hazards of unlimited liability and uncertainty of life. Operating as a single proprietorship, the owner takes the risk of losing his entire personal fortune if the business fails. Moreover, the individual enterprise as a legal entity ends when the proprietor withdraws, becomes legally incompetent, or dies. Since many enterprises must continue longer than the uncertain existence of a single human being, more durable forms are required. This is true of nearly any business that must mobilize large amounts of capital from a wide variety of sources. Another grave defect of the proprietorship is its limited capacity to obtain capital. The personal fortune and borrowing capacity of even wealthy individuals are far below the capital requirements of some modern enterprises. If an individual attempts to diversify or scatter risks, the amount available to any one enterprise is still further limited. Moreover, an individual is seldom so wise or capable that he cannot profit by the advice of another. Two heads are not always better than one, but an outside check will often avoid mistakes) Individuals differ in their capacities and interests; some have a flair for 'invention, others can "sell iceboxes to Eskimos," while still others can purchase wisely or manage efficiently. In the small or large concern, from farming to the billion-dollar business, a combination of abilities and skills, carefully blended and balanced, will produce the best results. Since only unusual individuals have all these qualities, and they cannot always be found in the hired employees that single proprietors can afford, some pooling of talents is advantageous. Often, however, there is more pooling than talent, and no business form, simple or complicated, gives assurance that the most important ingredient of business success—wise management—will be obtained.

Partnership.—The partnership has certain advantages over the proprietorship, but it has certain obvious disadvantages as well. It is created by a union of the skills and capital of several individuals operating under a contract. The contract is usually written, but it may be oral. Even in the absence of an express agreement, the law will sometimes assume a partnership to exist where there are such indications of a partnership relationship as profit sharing, common interest or investment, and common control over a business.

The partnership is the obvious answer to the need for more capital, a sharing of risk, and the pooling of managerial talent. It, too, is as old as the history of human relationships. The partnership is not a distinct separate or legal entity. Each partner may act in the name of the partnership, and each partner is bound by the actions of his copartners. Because of this personal character it has those constitutional protections that apply to its members as individual citizens, and it is free to move from state to state without interference. It can be formed by simple agreement, without filing any papers with the state, and therefore has great flexibility. It can act with reasonable promptness. There is a direct line between the efforts and efficiency of the individual partners and the rewards to the partnership, but these lines are 'sometimes blurred and friction arises because one partner may suspect that he is doing too much and the others are doing too little. The partnership authority and responsibility can be divided so that the ability and strength of each partner can be

effectively utilized. Because the partners have unlimited liability, its credit standing is higher than that of a corporation comprising the same individuals. This advantage, plus the need for a high measure of confidence, accounts for the fact that investment banks and security brokerage houses are frequently organized as partnerships. The New York Stock Exchange permits only individuals associated with noncorporate firms to own memberships or "seats" in the exchange to insure the highest measure of financial responsibility. Perhaps the most notable partnership in recent years was J. P. Morgan and Company, which consisted of fifteen partners until incorporation was forced upon it by the Banking Act of 1935.

With respect to governmental control and taxation, the partnership is like the proprietorship. Both forms are free from special governmental control. Regarding taxation, the partners are taxed only as individuals for their share of the partnership profits whether distributed or not. The greatest advantage of the partnership over the proprietorship is its capacity to raise larger amounts of capital, share risks, and combine the abilities of several enterprisers.

The partnership does have certain serious drawbacks. Since each partner is a general agent of the partnership, he can bind the partnership in any transaction within the scope of the business, regardless of the provisions of the partnership agreement. If a partner whose duties are limited by the partnership agreement to acting as sales agent makes commitments for raw materials or equipment used in the business, such a contract is binding on all the partners, even to the extent of their personal fortunes. Hence a partner, in effect, becomes personally liable for all the mistakes of his copartners, a risky matter where many partners are concerned and a prohibitive hazard if one is not sure of their character, ability, and integrity. The law protects each partner to the extent of permitting him to choose his partners; none can be forced upon him. From this it follows logically that whenever a partner dies or withdraws the partnership is terminated, and if the business is to be continued by the surviving partners or by others, a new partnership must be formed. This easy disruption makes the partnership even more unstable than. the proprietorship, since several individuals can dissolve it. Thus the partnership was only a partly satisfactory answer to the need for a device to pool capital and management as enterprises grew larger and larger. It has been effective in limited areas where few partners, well known to each other, and small amounts of capital were involved. In most fields the large partnership rapidly gave way to the corporation as soon as the latter became easy to organize. The corporation remedied the defects of the partnership. It provided freely transferable shares, continuous life, centralized management, and, most of all, limited liability—at some cost, to be sure, but ordinarily more than worth it.

Uncommon Forms of Business Organization.—Before turning our attention to the corporate form, brief consideration will be given to some relatively unimportant forms of business organization lying somewhere between the partnership and the corporation, and having some of the characteristics of both. They are interesting examples of ingenuity and invention. They also help to trace the progress from simple to complex forms of organization.

LIMITED PARTNERSHIP. The limited partnership was perhaps the first step in this direction. First provided for under the laws of Louisiana, which alone of the states followed the Roman and French legal traditions, it can now be organized under the statutes of practically all states. (It permits limited partners to furnish capital for the business and share in the profits without incurring liability beyond their initial investments. The limited partner may not act as an agent, participate in management, or represent himself as a general partner of the business. Notice must be given to all creditors that it is a limited partnership and that some partners are not personally responsible for the obligations of the business. A limited partner's interest may be transferred without terminating the partnership. There must be one or more general partners with unlimited liability in each limited partnership.) In states where its legal status is clear and well established, this form of organization may be useful and safe, but outside its home state it may be treated as a general partnership,

making all partners unlimitedly liable for its debts. Except for low organization expense and the tax advantages of the partnership, it has little to commend it over the corporation. The limited partnership is now widely used in the production of theatrical plays, where risks are great, where some of the backers desire to limit their liability, where losses on some ventures can be offset against profits on others, and where the corporate income tax is especially burdensome.

IOINT STOCK ASSOCIATION. The Joint Stock Association, or share-issuing partnership, is well known in both British and American history. In both countries it is commonly known as the joint stock company. But it differs in not having a government charter. It is organized under a private contract drawn up between the participants and resembling articles of copartnership. It differs fundamentally from the partnership and is like the corporation in these respects: (1) its shares are readily transferable and its life is therefore continuous; (2) the owners are not general agents, instead management is centralized in a board of directors or a similar body; and (3) for federal income tax purposes it is taxed like a corporation. It differs from the corporation in these respects: (1) its shareholders are unlimitedly liable, unless provisions to the contrary are inserted in each contract; (2) organized under common law by agreement, it does not have a charter or pay organization fees; (3) it is freer from government supervision; and (4) because of its personal character it has greater mobility from state to state. Except for the early railway express companies (Adams, American, and National), this form of organization has been unimportant in the United States. For all but a few isolated purposes it is inferior to the corporation, and its use is largely of historical interest. At present, a few states, such as New York, have special statutes governing the organization of these associations.

Business Trust. Another device that arose under common law to fill a special need is the business trust, commonly called the Massachusetts trust because of its popularity in that state. It, too, was well known in England during the century of re-

stricted corporate charter granting. It is essentially a device by which a business is organized and operated by placing the title to all its properties, materials, and cash in the hands of a trustee or group of trustees. The trustee issues transferable trust shares or "certificates of beneficial interest" (either common or preferred) to those who provide the capital. These shares, which are usually confused with corporate stock by their owners and the public at large, entitle the owners to share in the profits of the trust when and if the trustees see fit to declare dividends.

The trust instrument (a private agreement in place of the corporate charter) arms the trustees with power to manage the trust's business affairs through the selection of its officers, defines the scope and direction of the business, and fixes the rights and responsibilities of the trustees and certificate holders. If it is a true trust, the shareholders have no power to elect or remove trustees each year; if they have such power, the courts construe the association to be more like a partnership than a trust, and therefore may subject its certificate holders to unlimited liability. (Such liability can be avoided only by special stipulation in each contract.) Thus the certificate holders face a dilemma: they either lose control over the management of their property or face unlimited liability. Apparently, they prefer the first horn of the dilemma, and expect protection by choosing trustees with extreme care. These trustees, in turn, choose their successors. As far as the writer knows, this confidence in trustees has generally been well founded.

Here, again, is a noncorporate device for achieving continuous life, centralized management, transferable ownership, and limited liability. Its popularity in Massachusetts is attributable to a former provision in the laws of that state forbidding corporations to own and operate real estate within the state, except where it is incidental to other business. Although the law was repealed in 1912, there are many real estate trusts still operating in Massachusetts today.

Another peculiarity of Massachusetts law explains why the trust form of organization is popular with public utility holding companies owning the stocks of Massachusetts operating com-

panies. Because of statutory restrictions on the ownership of such stocks by outside corporations, trusts or voluntary associations have been organized to buy up stock interests in Massachusetts utilities. The most striking example of this type of organization is the old International Hydro Electric System, which controlled the New England Power Association, which in turn controlled subsidiary companies, many of which were organized as trusts. Under the Public Utility Act of 1935, some of these have been dissolved or reorganized.

The usefulness of the trust device is not limited to real estate projects or electric power combinations. This form has also been adopted by many investment trusts, organized to invest shareholders' money, usually in common stocks of leading American corporations. Enterprises as diverse as the Pepperell Manufacturing Company (cotton textiles) and the Great Northern Iron Ore Properties (iron ore) are organized as business trusts.

The trust has the advantages of being easy and inexpensive to organize, free from personal liability (if a true trust), adaptable as to purpose, and reasonably mobile between states. Its greatest drawbacks are, first, the possibility of unlimited liability to shareholders if they exercise effective control over trustees, and, second, a somewhat uncertain life. Most states limit their duration, usually to twenty-one years after the death of one or more of the trustees. Renewal is possible only by the express agreement of all owners, and such agreement may be difficult to obtain. With respect to federal and state income taxes, business trusts are usually taxed as corporations. However, they avoid incorporation fees and minor taxes. Sometimes, as in Massachusetts, the law requires that the declaration of trust be filed with the state and annual reports submitted.

Business, or Massachusetts, trusts should not be confused with trusts in the sense of monopolies, or with trust companies, which are banking institutions organized as corporations. The trust as a form of organization is fully legal, but like the other forms it obviously may not be used for illegal purposes. Its use seems to be explained largely, though not entirely, by inability to use the corporate form for specific purposes.

LIMITED PARTNERSHIP ASSOCIATION. In addition to these unusual forms, which sprang up naturally to meet business needs, a few states have tried to provide a type of organization that would give to small business units the advantage of the corporate form without its drawbacks. This type is usually known as the limited partnership association, and is found in only a few states, notably Michigan, Pennsylvania, and New Jersey.

These "incorporated partnerships" are like corporations in these respects: (1) they must file articles of association with the state; (2) they have transferable shares of ownership and continuous life; (3) they act through delegated management (officers); and (4) they have limited liability in their home state. The chief difference from the corporation is that new owners of stock must be elected by a majority of the owners and a majority of the stock. In this peculiarity it resembles the partnership; control cannot be transferred to outside interests against the wishes of the old owners. Except for a somewhat lower cost of organization and freedom from regulation, this type has little advantage over the corporation. It has the positive disadvantage of possible unlimited liability if it transacts business in other states, since courts frequently treat it as a general partnership in foreign states. This probably explains why it is authorized in only a very few states and apparently has not been very popular. However, if and when the states decide to crack down with restrictive legislation aimed at large corporations, but hitting small ones as well, the limited partnership association may be a haven of refuge for small firms. That day does not seem to be in sight as vet.

The joint venture, the underwriting syndicate, and the mining partnership are other types of organization that have evolved to meet particular needs, but they are of little general interest. All are species of partnerships with modifications in one or more important respects, such as duration, transferability of partnership interests, or centralized management. They need not concern us here.

Enough has been said so that we can perceive the evolution and adjustments that have taken place to accommodate the business unit to new needs. In general, these other forms are inadequate substitutes for the corporation as we know it today.

REFERENCES FOR FURTHER READING

- Burtchett, F. F. Corporation Finance. (New York: Harper & Bros., 1934), Chs. 14, 15
- Cherrington, H. V. Business Organization and Finance. (New York: The Ronald Press Co., 1948), Chs. 1-3.
- Donaldson, E. F. Business Organization and Procedure. (New York: McGraw-Hill Book Co., Inc., 1938), Chs. 6, 7.
- Gerstenberg, C. W. Financial Organization and Management, 2nd rev. ed. (New York: Prentice-Hall, Inc., 1939), Chs. 4, 5.
- Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Chs. 2, 3.
- Owens, R. N. Business Organizations and Combinations, 3rd ed. (New York: Prentice-Hall, Inc., 1946), Chs. 1-6.
- Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century Co., Inc., 1942), Chs. 1, 3-5.

Chapter 4

ORGANIZING THE CORPORATION

The full meaning of present-day corporation laws can best be grasped if we look at the process of incorporation as a part of the everyday business life of the community. It is a formal phase through which each corporation usually goes only once, but its implications are much broader than the convenience it affords to a group of prospective enterprisers or even a single enterpriser. We must try to see not only how well the corporate form meets the needs of profit-seeking entrepreneurs, but also how far it meets, or conflicts with, the needs of a society whose predominant economic characteristic is individual enterprise. It has become fashionable to regard the corporation laws of our fortyeight states and the District of Columbia, as loose, lax, or worse, inviting abuse and fraught with dangers to the public. On the other hand they make incorporation so simple and inexpensive as to be accessible to everyone. Let us look at the various aspects of incorporation in their modern setting.

Ease of Incorporation.—The process of incorporation is so simple that for most small and medium-sized concerns it has become a routine procedure. The prevailing attitude of the law of each state is that the privilege of incorporation should be open to all, without discrimination, upon the satisfaction of certain minimum requirements. Because of the competition between states for the "business" of granting corporation charters in return for incorporation fees, these requirements have tended to become less and less restrictive. Many states, especially Delaware and the sparsely settled western states like Arizona and Nevada, have found incorporation fees a painless way to replenish the state treasury and reduce the citizen's tax burden. (It is reported that in 1935 Delaware collected over a quarter of a

million dollars of incorporation fees, and New York over a million and a half dollars.) Other states have had to liberalize their laws to stay in the race. But not all changes have been due to competitive laxity. As time has passed, the public distrust of the corporate form that carried over from the days of royal favor, special privilege, monopolistic power, and government authority has largely disappeared. Both in England and in the United States it is no longer necessary to insist upon the restrictions earlier thought essential to protect the public. To make the corporate form more adaptable to everyday business needs, such requirements as a proven public purpose, unlimited liability, careful legislative consideration of each charter, and even par value stock have gradually been relinquished. Just when or where such liberalization became laxity, it is difficult to determine.

Moreover, there has arisen a group of specialists in corporate organization, from the individual attorney to the Corporation Trust Company, whose services are available to those wishing to form a corporation. Some offer to undertake the entire job of arranging all the legal details—particularly for out-of-state applicants—such as drawing up and filing the certificate of incorporation, furnishing the incorporators, holding the first meeting. adopting bylaws, appointing the officers, and acting as resident agent for the corporation. Seager and Gulick, reveal how an obliging officer of a trust company in South Dakota wrote: "In nineteen cases out of twenty, . . . we are able to get the charter into the mails within ten hours after the application is received here." Similarly, those engaged in procuring Nevada charters sent, upon request, alluring pamphlets proclaiming the cheapness and advantages of a Nevada charter. However, most corporations probably do not obtain charters by way of these mail-order devices, and only the large or special-purpose corporation is likely to shop for a charter. While it is true that some states are more lenient and inexpensive than others, the typical corporation is likely to be organized in its home state.

¹ H. R. Seager and C. A. Gulick, Jr., Trust and Corporation Problems (New York: Harper & Bros., 1929), p. 45.

The Certificate of Incorporation.—The actual process of incorporation begins when the incorporators (usually at least three persons are required) or their attorneys draw up a certificate of incorporation, or an application for such a certificate, as required by state law. This document states the intention to form a corporation and designates the distinctive corporation name or title. Usually the words "corporation," "company," or "incorporated," or an abbreviation of one of these must be used; British and Canadian companies require "limited" or "Ltd." to be used to designate a firm with limited liability. The certificate specifies the purpose for which the corporation is formed, the location of the principal office, the authorized capital stock, the duration (if not perpetual), the names of the incorporators, and any other provisions, such as duties, powers, and immunities of directors and stockholders, not contrary to law. Usually, the certificate is made in duplicate or triplicate, signed by the incorporators, acknowledged before a notary public, and filed with the secretary of state who stamps or otherwise certifies the duplicate. This becomes the charter and permits the corporation to begin activity. Of course, the payment of incorporation fees to the state must be made before certification.

Bylaws.—Ordinarily, the charter does not make detailed provisions for conducting the affairs of the corporation. These provisions appear in the corporate bylaws which are adopted by the shareholders or by the directors at the first meeting and may be amended or changed at subsequent meetings. They cover such topics as stockholders' and directors' meetings, methods of voting, quorums, qualifications and powers of directors, choice of officers and their powers, the issuance and transfer of stock, limitations of debt, and other matters pertaining to the management and operations of the corporation. If the board of directors is to act through executive committees the bylaws should so specify.

It must be remembered that corporations are creatures of the state and so the rights and powers of the corporate entity and the relationships between the corporation and its stockholders are subject to the authority of the state. This authority expresses itself through three sources, the state constitution, the state statutes (principally laws pertaining to incorporation), and decisions of the state courts. The provisions of the certificate of incorporation and the bylaws must be construed in light of the superior authority of the constitution, the state statutes, and court decisions. Thus complete knowledge of the rights, powers, and responsibilities of the corporation and those associated with it embraces legal sources other than the charter and the bylaws.

Management of the Corporation.—After the certificate of incorporation has been filed with the state and the corporation comes into existence, the process of getting under way begins. The first meeting of the stockholders is held; directors and officers are elected; and bylaws are adopted. Usually only a few dominant stockholders or the promoters of the concern are present at this meeting.

The board of directors has the final authority to manage the affairs of the corporation. Its powers are usually broad, and sometimes made even more sweeping by provisions of the charter. Individual directors are powerless to act for the corporation, but the board acting as a unit determines corporate policy and appoints and supervises the operating officials. It must approve such policies as the mortgaging of corporate property, the issuance of new securities, and the declaration of dividends. Because the directors are supposed to act for the benefit of the corporation and its stockholders and are responsible to the state for compliance with the law, they are ordinarily held individually liable for such actions as causing the corporation to act beyond its powers (ultra vires) or contrary to law. Furthermore they may become individually liable for the payment of dividends resulting in the impairment of capital stock; for lending the concern's money to directors or stockholders; for granting preferences to stockholders over creditors when the corporation is insolvent; for issuing false statements and reports; and for gross negligence in the management of the corporation's property.

The officers are appointed by the directors and act as agents of

the corporation. Their duties are prescribed in the bylaws and their discretion is limited; hence they do not assume the same risks of individual liability as do the directors. The chief executive officer is the president, who is frequently but not always the chairman of the board of directors. He is the active head of the entire management and provides the leadership of the corporation. Below him are one (or more) vice-presidents, who may be active executives in charge of subdivisions of the business, or they may occupy more or less inactive positions of an honorary nature.

The other officers of the corporation are the secretary and the treasurer. The secretary is responsible for keeping the records of the corporation, issuing notices of stockholders' meetings, signing important documents, and the like. The treasurer has custody of corporate funds, and is responsible for the administration of the financial affairs of the corporation and for issuing financial reports. Frequently he takes the lead in determining financial policies, and is not a mere custodian of funds.

Rights of Foreign Corporations.—We have already seen how easy it is to get a charter from many states, no matter where the corporation intends to carry on business. But how is it possible to incorporate in one state and carry on business in others? The answer is that all states permit foreign corporations to carry on ordinary kinds of business within their borders. (Special types, such as public utility, railroad, and banking corporations, must usually be organized within the state in which they do business. Most large railroads are incorporated in several states.) To do business in other states is a matter of privilege and not a right of the corporation. Our Constitution (Art. IV, Sec. 2; Art. XIV. Sec. 1) forbids any state from discriminating against the citizens of other states, but a corporation is not considered a citizen by the courts and is therefore not entitled to the privileges and immunities of a citizen in other states. Legally, a state may place restrictions upon a foreign corporation wishing to do business within the state. It may not interfere with legitimate sales or business done across state lines, for that would violate the interstate commerce provisions of the Constitution (Art. I, Secs.

8, 9, 10). A state may restrict the right of a foreign corporation to own real estate, establish sales offices, engage in productive operations, etc. For example, in 1945 the United States Supreme Court held that the state of Oklahoma could levy a tax of 4 per cent on premiums collected in that state by insurance companies organized in other states, even though no comparable tax was levied on Oklahoma-chartered insurance companies. But states seldom impose such restrictions; reciprocity and comity between them are so generally practiced that the procurement of a permit or license is routine, and the fees or taxes imposed are usually reasonable. This mutual respect has become so well established that it is not likely to be disrupted easily, although, legally, any state might impose restrictions at any time.

Choosing the State of Incorporation.—Large corporations, with scattered facilities, are inevitably foreign corporations in most states in which they operate. Small local corporations are foreign when they obtain a charter from an outside state. For both types there may be compelling reasons to choose one state rather than another.

A few states require five incorporators, while most states require three or less. Most states permit all of the incorporators to be nonresidents, but a minority of them require one or more to be residents. However, both of the above requirements can be easily complied with even if one person wishes to organize a corporation in a distant state. He may induce his friends or may hire a lawyer or clerk to act as "dummy" incorporators. Immediately after the corporation is organized, the dummy reassigns to the real owner any stock that he may have had to hold in his name for purposes of incorporation. This use of dummies explains how many one-man enterprises get incorporated and why it is so easy to obtain mail-order charters. The same device may be used in the small number of states which require at least one resident director.

The matter of breadth of corporate powers is of more significance. In most states it is easy to write into a corporate charter such wide grants of authority that there is little danger of committing an unauthorized (ultra vires) act. It is now com-

mon for states to permit incorporation of firms (except banks and public utilities) whose scope of activities is limited only by the fertile imaginations of their specialized corporation lawyers. It has been said that some companies have charters giving them power to do anything except "coin money and commit murder." Even in the days when corporate purposes were narrowly and specifically defined. Aaron Burr was able to operate the Bank of Manhattan through a charter he obtained to furnish the city of New York with water. For years the state of Pennsylvania apparently drove incorporators to near-by New Jersey or New York by restricting each corporation to a single purpose. In 1889 New Jersey attracted a flood of new incorporations by revising her laws to permit corporations to be organized for the purpose of owning stock in, and so controlling, other corporations. Many of the trusts organized before the turn of the century sought these holding company powers and other states soon adopted similar amendments. Holding company powers can now be obtained in three-fourths of the states.

The choice of a state may depend on such things as minimum capital requirements before beginning business (most states have either no requirement or a minimum of \$1,000 or less), the privilege of issuing no-par shares (now almost universally granted), and the accounting for the proceeds of no-par shares. Some states require that all proceeds received from sale of the stock be credited to capital stock and kept permanently in the business; others permit the directors to divide the proceeds between capital stock and paid-in surplus, as they see fit.

The limitation of stockholders' liability is an important consideration. Incorporators formerly avoided states like California and Minnesota in which stockholders were liable for assessments upon their stock in case of failure, but now these states have the standard liability provisions. Another factor is the ease with which stock can be exchanged for property and services, and the accountability of the directors for accurate valuation of such property and services. Courts in some states follow the rule that directors must only show "good faith" in valuing property for stock issuance, while others follow the somewhat stricter "true value" rule.

Liberality of the law concerning dividends varies from state to state. Some states, such as Delaware, Nevada, and New Jersey, permit the payment of dividends out of current earnings even if the corporation's capital is impaired (i.e., if the total assets are less than the liabilities plus capital stock), whereas the general rule is that dividends can be paid only if capital is unimpaired. Moreover, states differ with respect to conditions under which dividends may be paid out of paid-in surplus or from surplus created by reductions in the stated value of the capital stock.

Some states, such as Delaware and Rhode Island, permit corporations, by charter provision, to deprive the stockholders of the pre-emptive right to subscribe to new stock before it is issued to outsiders. This provision is of dubious merit to the welfare of the corporation, and may prove harmful to the stockholders.

States, such as Delaware, which permit directors' responsibilities to stockholders to be limited by charter provision may be attractive to those wishing to have private dealings with the corporation, or to those who fear that stricter standards of personal liability would deter capable persons from accepting directorships.

The duration of the corporate charter is of some consequence. Only about half the states grant perpetual charters, but the remainder usually provide for easy and inexpensive renewal of limited-term charters.

Promoters wishing to perpetuate control with a small investment of their own funds will avoid the few states where all stock, common and preferred, must be given voting power.

Many requirements are so easily met that they are of little consequence. For example, most states require that the corporation maintain an office within the state. This regulation can be met by using the address of a law office or a trust company and having the corporation's name displayed there. A single room may serve as the resident office of many corporations. The requirement that all stockholders' annual meetings be held within the state is also easily met. Even under the most favorable circumstances, stockholders' meetings are poorly attended, and

most of the voting is done by proxy, that is, by authorizing someone else, usually corporate officers or directors, to vote the stock. The proxy form, complete with a stamped return envelope, is sent to each stockholder with the notice of the annual meeting. The management, armed with these proxies, travels to its legal residence in the state of incorporation, holds the meeting, reelects itself, submits its annual report, ratifies its actions, adjourns the meeting, and catches the next train home. Of course, participation by stockholders is discouraged if annual meetings are held in a distant state, and corporations wishing to encourage large attendance (and many of them do) will incorporate in or near their home locality or in one of the many states not requiring annual meetings to be held within that state. Cumulative voting, whereby minority stockholders can concentrate their votes on one or two candidates and thus secure representation on the board of directors, is permitted in most states. Practically all states require an annual report, but this requirement is easily met because reports are primarily for tax purposes and are very general in nature.

A few states, such as Rhode Island, permit the issuance of par value stock at less than par, if authorized by a majority of the stockholders and stated in the stock certificates, without making the stockholders liable for the deficiency. However, this contingency can be met in most states by the use of no-par stock in the first place, by reducing par value, or by changing from par value to no-par value.

Most states permit fundamental amendments to the charter by a two-thirds vote of the stockholders, although unanimous consent is necessary in the absence of specific charter provisions. Similarly, only a two-thirds vote is necessary to sell or lease the entire assets or dissolve the corporation.²

The choice of a state of incorporation will hinge materially upon what it costs, in fees and taxes, to incorporate in one state rather than in another. Here, the states differ considerably. In general, the western states, such as Nevada, Oregon, and South Dakota, have tried to attract incorporation by emphasizing

² For further reading see Seager and Gulick, op. cit., pp. 35-48.

cheapness, while eastern states, such as New York, New Jersey, and Delaware, have not. The latter are, nevertheless, popular incorporation states. The taxes involved are usually incorporation or filing fees, annual franchise taxes, and inheritance taxes. Other and more burdensome taxes, such as the federal corporate income tax, state corporate income taxes, capital stock taxes, stock transfer taxes, property taxes, occupational and license taxes, and commodity taxes, have little or no reference to the state of incorporation, and so do not influence the decision.

Incorporation fees differ greatly from state to state; in most states the minimum charge is \$25. The fee is graduated according to the authorized capital stock, but the difference in cost does not become great until the authorized capital stock exceeds \$1 million. The organization fee for a \$100,000 corporation is less than \$100 in most of the popular states, and the \$1 million corporation would find its fee varying from \$100 in Arizona to over \$500 in New York. Larger corporations will find the discrepancy much greater, particularly if no-par stock is authorized. At one extreme are states which tax each no-par share as if it were \$100 par; at the other is Arizona which charges the same fee whether par or no-par shares are issued. Most states tax no-par shares at from 1 cent to 5 cents per share, but a few base the tax on the selling price of the shares rather than their number.

In his book, The Delaware Corporation, R. C. Larcom has highlighted the significance of incorporation fees to giant corporations authorizing a large number of no-par shares. To illustrate, Standard Brands, Inc., organized in Delaware in 1929 with an authorized capital of 21 million shares, would have paid the following fees: Arizona, \$85; Nevada, \$2,100; Delaware, \$43,050; New Jersey, \$210,000; New York, \$1,050,000. This is, of course, an extreme case. Ordinarily, the difference in the organization fee, since it is paid only once, is not a determining factor for any except very large corporations, or small corporations engaged in highly uncertain enterprises, where cheap incorporation is desired.

Annual franchise tax impositions are also diverse. Many states, including New York, South Dakota, and California, have no such tax, while others, such as Nevada and Arizona, impose a

flat annual tax of \$5 and \$20 respectively. The remaining states impose a tax graduated according to the capital stock. In Delaware the fee is \$5 for \$25,000 capital stock, \$10 for \$100,000 capital stock, and \$50 for \$1,000,000 capital stock. There is little evidence that this tax has been a major determinant of the state of incorporation.

On the whole, tax considerations, though of importance, are not decisive for the average corporation.

Before deciding upon a state, the enterprisers or promoters will also want to consider additional factors. The general reputation of the state is of some significance to the credit standing of the corporation and its ability to sell securities. If it is organized in cheap or lax states, questions of integrity, reliability, and good faith may be raised in the minds of many. Why should a corporation doing all its business in Massachusetts get a charter from Nevada or one in New York from Arizona? Although the purpose may be perfectly legitimate and the promoters of the highest integrity, suspicions are likely to arise.

Again, it is best to organize in a state whose law is stable and well understood and where the courts have interpreted all the important provisions. This, rather than laxity or cheapness, is one important reason why Delaware, New York, New Jersey, and Ohio are popular states, particularly for large corporations, and it may help to explain why even the New Deal found the Delaware law to its liking in chartering some of its leading government corporations, such as the Commodity Credit Corporation.

In any event smaller corporations may find it annoying and inconvenient to comply with two sets of state statutes instead of one. Every state in which the foreign corporation does business has certain requirements which must be met. For example, Rhode Island requires (1) the filing of a copy of the charter; (2) a certificate giving the corporate name, nature of the business, and other information; and (3) the appointment of a resident attorney for the service of legal process. The corporation must pay filing fees totaling \$32 and a yearly fee of \$2 when it files the statement. These fees vary greatly from state to state.

Are Incorporation Laws Too Lax?—Thus far we have considered present state incorporation laws largely from the point of view of the incorporators. In general, incorporation is easy, relatively inexpensive, and expeditious. Corporate powers are granted with a free hand, and some of the states permit wellestablished protections of common law, such as the pre-emptive right and the liability of directors when dealing with the corporation to their advantage, to be nullified by charter provisions. No-par stock has become commonplace; nonvoting stock was popular twenty years ago but is less so now; proxy voting is universal, permitting management to perpetuate itself for better or worse; dummy incorporators are openly accepted; holding company powers are as easy to get as a fishing license; management reports to the state and to stockholders are not required by state law to be truly informative; stock may be issued to excess for overvalued property or services; loose dividend policies may be followed which, together with stock "watering," deny the corporation creditor the protection of a "trust fund" of stockholders' capital. Our generous corporation laws, however conducive to facile organization and efficient administration of the business unit, are sometimes criticized for their possibilities of abuse, for the number of barn doors they leave open.8 Even if we grant that recent tendencies toward liberalization may be justified when used with care and a sense of responsibility, have they provided us with a corporate system that tends to be dangerous to the general public because of its susceptibility to abuse? Might we not be better off with less "free and easy" incorporation of business enterprises, and retrace our steps at least part of the way toward the era of restrictive and more expensive incorporation, narrowly defined corporate purpose, par value stock, stricter liability of stockholders and directors, restrictions on holding company powers, and the rest? These are challenging public issues that the student of the private business corporation should attempt to understand, even when he is concerned primarily with the corporation as a useful device for organizing the entrepre-

³ W. Z. Ripley, Main Street and Wall Street (Boston: Little, Brown & Co., 1929), is something of a classic on corporation excesses in the 1920's. See also A. A. Berle, Jr., and G. C. Means, The Modern Corporation and Private Property (New York: The Macmillan Co., 1933).

neurial function. For if the corporation as we know it is deficient, it should be changed or it may bring disrepute to the economic system with which it is so closely identified. It is hoped that the reader will be able to answer at least some of these questions for himself as we study more closely the operations and policies of corporations whose size is large enough to make them of public significance.

REFERENCES FOR FURTHER READING

Gerstenberg, C. W. Financial Organization and Management, 2nd rev. ed. (New York: Prentice-Hall, Inc., 1939), Chs. 7, 8.

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Ch. 4.

Hoagland, H. E. Corporation Finance, 3rd ed. (New York: McGraw-Hill Book Co., Inc., 1947), Ch. 5.

Husband, W. H., and Dockeray, J. C. Modern Corporation Finance, rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Chs. 3, 4.

Larcom, R. C. The Delaware Corporation. (Baltimore: The Johns Hopkins Press, 1937).

Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century Co., Inc., 1942), Chs. 6, 7.

Chapter 5

COMMON AND PREFERRED STOCK

Capital Stock.—Of all who may have interests in the activities and success of the corporation, perhaps no group, with the exception of management, has a more immediate and universally recognized interest than the shareholders. A body of owners is the very essence of the corporate concept. A corporation may or may not have creditors, workers, customers, or even management, but it must have owners to exist. It is these owners who presumably elect the management, check management's performance and change it if they are not satisfied, change the nature and structure of the business if they wish by amending the charter, share the profits or losses, and supply the "risk" capital that acts as a cushion to absorb the shocks that a business so frequently encounters. This provision of risk capital is of crucial importance to every enterprise and to society as a whole. Without it economic activity becomes sluggish and incapable of responding to the wants of society with the alacrity and force that mark the healthy economy. The place of the stockholder in the corporation is therefore of paramount significance.

One might make fine distinctions in the use of terms, but such refinements are matters of definition and classification, and seldom aid in understanding. The capital stock of a corporation can be thought of as that amount which represents the permanent commitment by the stockholders to the corporation. It is the paid-in capital stock which is issued and outstanding. Additional stock is usually authorized by the charter, but this does not become part of the capital stock until it has been issued, upon a vote of the stockholders or directors, by sale for cash or by exchange for property.

The capital stock is represented in the accounting records of

the company as a proprietorship item. It is carried on the liability side of the balance sheet to show the permanent investment by stockholders and the corresponding responsibility of the corporation to the stockholders. At the inception of the corporation it may or may not represent the total amount paid into the corporation (in cash, property, or services) by the buyers of stock. Where stock with par value is sold, the law requires that the capital stock account represent the full par value. In a few states, like Rhode Island, par value stock may be issued for less than par. If stock is sold above par, the balance of the purchase price will be credited to the paid-in surplus account. Where nopar stock is used, the practice varies depending on the decisions of the promoters and the laws of the state of incorporation. Where no-par stock is issued at a stated value, the corporate charter specifies the amount at which the stock is to be sold. This virtually becomes par value and the capital stock account is credited with the stated value of each share issued. Where true no-par stock is issued, the price is usually determined by a vote of the stockholders, or occasionally by the directors alone, and the division of the proceeds between capital stock and paidin surplus is by law commonly left to the discretion of the stockholders or directors. A few states, such as Florida and Indiana, require the entire proceeds of sale to be credited to the capital stock account, while others, such as California and Minnesota, have a similar requirement for preferred stock only. In some states paid-in surplus may be used to absorb losses, offset property markdowns, and, under some circumstances, pay dividends; in these instances paid-in surplus provides a less permanent cushion than capital stock, and hence, it is commonly asserted, affords less protection for those doing business with the corporation) We shall explore this problem later on in the discussion of no-par stock.

The capital stock of a corporation is divided into shares of par value, or into a certain number of no-par shares.) The stockholder is probably more accurately described as a shareholder, as in England. His rights are those given to him by the charter and by the laws of the state. The only evidence he possesses of his position as a shareholder is a stock certificate, a formal-look-

ing engraved piece of paper signed by company officers, and possibly by an independent registrar and/or transfer agent, which merely states that he is the owner of a specific number of shares and has the rights attaching to such ownership. The rights, however, are not enumerated on the stock certificate. If he sells the stock, he must surrender the certificate to the company or its transfer agent to be canceled. Then a new certificate is issued in the name of the purchaser, whose name displaces that of the seller on the records kept by the company or by the transfer agent.

It is easily seen why new stockholders rarely consult the contract to which they become a party—the corporate charter. Since the stock certificate does not enumerate the provisions of the contract, one may ask, How can the stockholder be thought of as a party to a contract he has never seen? The answer, of course, is that at law he is presumed to have seen it since it is open to him if he takes the trouble to study it. But this presumption is unreal and sometimes works a hardship on the stockholder. However, it is no longer necessary for the inquisitive stockholder to be ignorant of the salient provisions of the contract embodied in the charter. Readily accessible summaries of the main provisions are published for all sizable corporations in the semipopular investment manuals which are available at most libraries, investment banks, and brokerage offices. More detailed information can be obtained from the state of incorporation at the nominal cost of a copy of the charter, and no stockholder need go without this important information. The law may be wise in presuming knowledge rather than in protecting ignorance and irresponsibility.

Rights of the Common Stockholder.—Much has been written about the rights of the stockholder. Actually he has only those rights which the corporate charter and state statutes confer upon him. These rights may be modified and expanded by decisions of courts which try to work out just and equitable solutions to the problems of intracorporate relationships. This "judge-made law" of courts of equity is said by some students of corporation law (A. A. Berle, Jr., and others) to be in the process of modify-

ing our traditional concepts of the corporation, particularly those arising from the fiction theory of the corporation.

Ordinarily, corporate charters and state laws confer upon stockholders a group of rights. However, these rights may be withheld or modified by charter provision. Since these modifications can be almost endless, we shall give emphasis here to those rights possessed by the holders of the most fundamental and least restricted type of shares—common stock.

Right to Share in Profits.—It would be possible to argue endlessly about the order of importance of the different rights of the stockholder, but since the position of the stockholder is essentially that of a venturer of capital in hope of gain, his right to gain income from corporate success is the chief motivating influence and probably his most important right. This right manifests itself in many ways, but it embraces principally the right to earnings, to assets, and to the sale of stock. The stockholder's right to his pro rata share of the earnings is qualified by the directors' discretion regarding the payment of dividends.

The law will seldom compel the payment of dividends, even when earnings are large, if the directors have seen fit to keep the earnings in the business. An exception is the famous case of Dodge v. Ford Motor Company, 204 Mich. 459 (1919), in which the company was forced by court action to disburse more than the contemplated \$1,200,000 of a \$50 million profit in 1915. The company had an accumulated surplus of over \$100 million (with only \$2 million of capital stock) and cash assets equal to about one-half of the surplus. Ordinarily, however, courts will not interfere with the decision of the directors, because dividend declarations are essentially matters of business policy in which the directors alone have discretion. In the absence of fraud the decision of the directors is usually final.

Present tax laws, particularly Section 102 of the federal corporate income tax law, place a penalty tax on "unreasonable" retention of earnings and the directors' hands may be forced by the fear of tax penalties. However, even if it involves a tax penalty, directors acting in good faith may retain earnings rather than distribute them as dividends. It is interesting to note in

passing that large corporations having widespread stock ownership have usually paid out a larger part of their earnings in dividends than have smaller corporations.

Right to Share in Assets.—The stockholder also has a right to share in the residual assets in proportion to his shareholdings in case the corporation is liquidated, partially or wholly. This right would seem to be of great importance, but actually it is unusual for the stockholder to attach much weight to his claim to assets. The reason is that the average stockholder buys shares in a going concern that will not be dissolved or liquidated. Ordinarily, corporations are dissolved only when they become financial failures. By that time they have incurred so much indebtedness that in liquidation the creditors receive all the assets and the common stock is worthless.

Corporations are infrequently liquidated while there are assets sufficient to pay all creditor claims and a substantial liquidating dividend to the stockholders. The reasons are not far to seek. Most business executives are optimistic. Even if the business cannot operate profitably at the moment, it will soon be "out of the red," "things are looking up," and so on. Moreover, no management wants to admit that it is a failure, particularly when the resultant liquidation means the loss of a well-paying job, and possibly slim prospects of another. It is natural for the management to avoid self-unemployment as long as possible. Sentimental reasons may prevent the liquidation of family corporations. Possible tax liabilities also deter liquidation.

Stockholders probably prefer to hope for the best rather than face the stark facts of failure and liquidation, but their interests, as opposed to management's, may lie in prompt liquidation. Any observer of stock price quotations is familiar with the common occurrence in which the liquidating value of each share of stock—based on the corporation's cash, securities, and current assets minus all debts and prior claims—is much greater than the quoted market price. This was once generally true of New England textile companies whose prosperous past had left an accumulation of cash assets in the corporate treasury, but whose dismal earnings record and uncertain prospects for the future

were reflected in low stock price quotations. The writer recalls one rather striking instance in which the stock of an old established Massachusetts cotton finishing concern could be bought for \$92 a share. Yet the company held cash, investments, and other current assets (with a large plant valued at zero), over and above all liabilities, equal to \$281 per share. Obviously it was "worth more dead than alive," and within six months an outside individual, seeing the possibilities of profit in liquidation, bought out the stockholders at \$305 a share and probably made a neat profit for himself. In the same manner, it has seemed odd to see cotton textile stocks spurt upward in price upon the news of an impending liquidation. Perhaps American managements have been far too hesitant rather than too ready to liquidate unprofitable enterprises before the cash assets are frittered away and there is nothing left for the stockholder.

Under the Public Utility Act of 1935, public utility holding companies are being forced into liquidation to simplify their corporate structures, and liquidation value is an important factor motivating the purchase of their stocks. However, even in the face of impending liquidation, market prices usually remain considerably below estimated liquidating value. The stocks of investment companies (investment trusts) have usually sold at substantial discounts from net asset value, especially where liquidation is not contemplated and the company does not offer to repurchase its shares. In general, stockholders pay little attention to their claims to assets since possibilities of liquidation, partial or complete, are remote. In any case, the common stock is the last to share in the assets—after all debts, taxes, wage bills, and preferred stock have been paid—but it does have a pro rata claim to all that is left. This residual position may make the claim to assets a highly uncertain one.

Right to Transfer Stock.—A third right of the stockholder is the right to sell or transfer his shares. This he can do without asking permission of anyone, and by this means he can cease to be an owner of the corporation in as short a time as it takes him to find a buyer. He has a quick and easy exit from a corporate situation he does not like. This solution is simple as compared

with trying to change the corporation or its policies. Moreover, since common stock represents a perpetual ownership equity, the sale of the stock is the only way of recovering the principal of his investment. Finally, the sale of the stock enables him to realize capital gains arising from the increase in the market price of the stock. The importance of easy transferability can hardly be overemphasized. Without it, shares of stock would be less attractive and the purchase of stock in the hope of capital gains—a most important incentive to stock ownership—would be discouraged. Perhaps as many stockholders buy stock in search of capital gains as buy to hold for dividends—particularly at present when only half of long-term capital gains are taxed as personal income, while all dividends received are taxed fully.

Of course, not all stocks are equally marketable since some are closely held with no active buying and selling taking place. Sometimes the corporate charter requires that the stock be offered to the corporation before it is sold to outsiders. The management can thus avoid the intrusion of undesirable elements and possible dangers of disunity, even though this provision may impair the immediate salability of the stock.

Pre-emptive Right. A fourth right of the stockholder is to protect his interest in corporate assets, earnings, and voting power by having the first opportunity to subscribe to new stock. This pre-emptive right has had legal sanction since 1807 when the Massachusetts Supreme Court handed down its decision in Gray v. Portland Bank. By exercising his right to buy new stock or by selling the right to others, he can make good any dilution of earning power or asset value that arises from an increase in the number of shares outstanding. Thus, if the right entitles a stockholder to buy one new share at \$10 for each four shares he now holds, and the asset value of each share before the offering is \$15, the value of the right attaching to each old share is

$$\frac{\$15 - \$10}{4 + 1} = \frac{\$5}{5} = \$1.$$

The stockholder can exercise his right by paying \$10 and getting one new share of stock, or he can sell the rights applying to his

58

four shares and receive \$4, thus making good the reduction in asset value per share arising from the new issue.

State laws vary in regard to the pre-emptive right. Apparently in some it applies only where there is an increase in authorized capital stock. Most states apply the rule only when stock is issued for cash, not when it is exchanged for property. In most, if not all, states, the right is limited to new issues of stock of the same kind. The right is commonly denied to preferred stock by charter provision and in some states the pre-emptive right may be taken away from the common stockholders by charter provision.

Control over Management.—One of the most important group of rights of the stockholder has to do with his control over the management of the corporation. Stockholders as such cannot manage a business or enter into contracts for it. Presumably, a person could own 100 per cent of the stock of a corporation, yet as a stockholder he would be powerless to buy a postage stamp in its name. Contrary to many present superficial observations, the corporation is not a device whereby the stockholders, as such, "run the company." The divorce of ownership from management has been one of the great accomplishments of the corporation, in contrast to the partnership. Because of this separation, a wedding of "money and brains," not always possessed by the same persons, is feasible. Without centralized management and decentralized ownership, the corporation would fall far short of perfection as an engine of business organization and finance. But the fundamental idea of the corporation is not that management should be completely independent of stock ownership. (In fact, it is assumed that the directors will represent the shareholders and manage the corporate affairs for them. The stockholders elect directors to carry out the general purposes as laid down in the charter, giving them the supreme executive authority to carry out these purposes. In the realm of management, the board of directors is usually the final arbiter of policy and method. Between elections the board of directors is supreme, except as the stockholders obtain intervention through the courts. The courts will interfere only on strong

grounds of fraud, deceit, or gross negligence, and not in matters of business policy.

Ultimate control remains in the hands of the stockholders only through their power to "throw the rascals out," and this possibility may be remote if opposition to the management cannot be mobilized. Frequently it is possible for management to entrench itself even though it owns only a tiny fraction of the stock. This is possible if only a small amount of the stock, held by the management, has sole or excessive voting power, giving management complete and undisputed control.) A striking example is the way in which Henry L. Doherty controlled the billion-dollar Cities Service Company by owning 1 million shares of 5 per cent preferred stock at a cost of one dollar per share. Each of these preferred shares had twenty times the voting power of a share of common stock held by the public. During the 1920's, nonvoting common stock (usually Class A stock) and special stock with multiple voting rights were commonly issued, thus concentrating control in the hands of those whose financial commitment to the enterprise was small. This device is still legal in most states, but since 1934 the New York Stock Exchange has refused to list new issues of nonvoting common stock, and federal legislation and the Securities and Exchange Commission have discouraged such issues.

The voting stock may be tied up in a voting trust under which stockholders surrender their voting stock in exchange for voting trust certificates. The trustees therefore have legal title to the stock and can vote it. These voting trusts are usually established to concentrate control in the hands of a capable group of men during a crisis in the corporation's life—at the time of promotion or reorganization or, in rare instances, to insure the carrying out of a court decree. A good example is the plan approved in 1948 for the reorganization of the Rutland Railroad. The Interstate Commerce Commission and the court proposed that the common and preferred stocks be placed in two voting trusts for a period of five years to insure continuity of management and prevent the road from falling into the hands of those who might dismantle it. The laws of most states permit this

device for separating voting power from the other rights of stock ownership, if the voting trust is for a lawful purpose and is limited in duration—usually to five years.

However, the most common reason why stockholders as a group fail to exercise even veto control over management is that stockholders in many large corporations are scattered over the face of the map, and it is costly to mobilize them for joint action. Few stockholders care to spend the time and money required. On the other hand, the management has every facility to mobilize these votes.) As before noted, the stockholder usually receives a proxy made out to management nominees, complete with stamped return envelope, along with the annual statement and the notice of the annual meeting. Ordinarily he signs and returns it or throws it away. Seldom does he get a chance to sign an opposition proxy, nor does he usually attend the annual meeting and cast his vote in person. Yet proxy battles to oust the management are not unknown. Contests have occurred in such large corporations as the Standard Oil Company of Indiana, Texas Corporation, Montgomery Ward and Company, and Standard Gas and Electric Company. It is interesting to note that a national proxy solicitation firm reported that in 1947 new presidents had been elected in 145 out of 643 large corporations surveyed by them. This indicates a high rate of turnover even if most candidates were unopposed.

The Securities and Exchange Commission, through its rules on proxy solicitations, lends its weight to dissident stockholders in corporations subject to its jurisdiction. In 1948 it ordered the Standard Gas and Electric Company to send the proxy solicitations of two stockholders opposing the management along with the management's own proxy requests. The company was also required to address envelopes to all stockholders for the two dissenters. This insures that those opposing management can take their case to the stockholders, if they wish to go to the trouble and expense. The commission also ordered the insertion in the proxy form of two resolutions proposed by the holder of only twelve shares of stock in the P. Lorillard Company, even though the management opposed the resolutions.

Right to Attend Annual Meetings.—The stockholder's right to attend the annual meeting should provide another means of checking up on management, but attendance at meetings is usually slim. A few companies, like the Standard Oil Company of New Jersey, go to the lengths of furnishing meals, refreshments, and entertainment to encourage stockholders' participation. But with this encouragement only about 400 of the 97,906 stockholders attended the 1946 meeting held in a Flemington, New Jersey, theater, although 77 per cent of the 21 million voting shares were represented by proxy or in person. A stenographic report of the meeting was sent to all stockholders.

Stockholder questioning of management may be mild or acrimonious. The wrath of stockholders who had lost money was loosed upon the management of the \$3 billion Electric Bond and Share Company in its 1942 annual meeting. The cause apparently was the management's unwillingness to fight the Securities and Exchange Commission's plan of corporate simplification. After tirades by several critics, one elderly stockholder is reported to have shaken his fist in the president's face and demanded to know how he was going to get back the \$4,000 he had paid for the stock, now worth only \$15! Perhaps stockholders can, if sufficiently irritated, impress management, but usually they acquiesce and follow management's lead.

Right to Sue Directors.—The force of the law may also be used to bring management to book. If a wrong is committed against the corporation, the law recognizes the right of the stockholder to bring suit to protect the corporation and his interests in it. This is one of the few cases in which a stockholder may act directly in the interests of the corporation; the directors obviously cannot be expected to act for the corporation in this contingency. Moreover, directors can be held personally liable for fraud or gross negligence. Under the common law, as modified by state statutes, directors ordinarily are personally liable for unlawful or ultra vires acts committed by the corporation with their knowledge, for making false reports, for paying dividends which impair capital stock, for lending corporation money to stockholders, for preferring one stockholder over another, for

gross mismanagement, or for deliberately conducting the business contrary to the interests of the stockholders. Their position relative to the stockholder does not fall into any clear-cut legal compartment. They are elected by the stockholders, yet they are not mere agents of the corporation, for agents can act only on the specific instructions of the principal.

The directors always act as a group and are elected to make the decisions, not to carry them out. The directors' decisions are then carried out by the officers of the corporation. The very nature of the corporation implies that the directors are invested with discretion and power far beyond the legal limits of agency. Their position has sometimes been compared to that of trusteeship for the stockholders, and yet it is a trusteeship only in the general sense.\ Like trustees, the directors are expected to act in the interests of others rather than themselves. This underlying obligation colors the relationship between the directors and the stockholders. Courts have extended this obligation to cover dominant stockholders or others who might be the actual makers of the corporate decisions. Even though many of the earmarks of a strict trustee relationship are absent, there is no doubt that courts are increasingly inclined to look upon directorships as positions of trust.

The general rule is that directors must not use their influence and superior knowledge of corporate affairs to their own advantage and against the interests of the stockholders.' In recent years lawsuits have been brought against corporate officials who were alleged to have sought personal profit by such means as favored stock purchases, excessive bonus payments, use of company funds to protect private speculative ventures, repurchase of stock at high prices by the corporation from favored insiders, and sale of stock to the corporation at excessive prices. Suits also have been brought against directors for negligence resulting in corporate failure and large losses to investors. Minority stockholders have been successful in securing a court order preventing the consolidation of two of the largest steel companies because the directors of one of the companies had acted in secrecy, hastily, and without adequate study of the project as it affected their stockholders. In 1945 a court approved a

settlement in which the Pennsylvania Railroad agreed to make a \$15 million restitution to Pennroad Corporation, which it controlled through interlocking directorships, for using Pennroad's funds to buy up stock in railroad companies that Pennsylvania wished to control. These stocks subsequently became worthless or sustained large losses.

Not all legal actions of this kind are successful. However, the mere fact that courts will consider such actions and decide them on the basis of standards of responsibility of those who hold powers in trust for others means that even the minority stockholder is not without a remedy against management for its misuse of power and knowledge. It is obvious that the chances of recovery must be sufficiently promising to warrant the expense of legal proceedings. Many lawyers are willing to take such cases on a contingent fee basis. In fact, these corporate troubled waters afford such fine fishing for indigent lawyers that the state of New York has seen fit to pass a law to bar "strike suits" against management that are without merit but which are brought principally in the expectation of getting a "nuisance settlement" out of court. In a study of over a thousand stockholders' suits filed in New York County from 1932 to 1942, it was found that the actions were brought by a small number of attorneys for stockholders who usually purchased their shares shortly before bringing suit, and that recoveries averaged only 3 to 5 per cent of the amounts claimed. It is to be hoped that legitimate claims will not be impeded in that state by this attempt to weed out sharp and unethical practices. As a legal principle, the responsibility of management to the stockholders should be plain and unequivocal, and the path of legal remedy kept clear for legitimate actions.

Right to Examine Records.—One right of the stockholders that bears at least indirectly upon management accountability has to do with access to the corporation's records of account. Published reports are sometimes inadequate and it would appear that the stockholder's ability to judge the performance of management would be conditioned by his access to the company's books. Here again, the legal right is not clear because of di-

versity of statutes and court decisions. Apparently, the right to access to the names and addresses of all the stockholders is universally recognized. Every stockholder should be permitted to know his fellow stockholders and to communicate with them. But here uniformity ends. A few states appear to require that all stockholders have access to all records at all times, but most states do not go this far. 'Corporations are generally permitted to withhold accounting data which competitors could use to advantage. In some states information is available only to representatives of those holding at least 5 per cent of the stock. The nature of the dilemma is clear. Stockholders should be permitted to know all the facts, yet if a corporation is required to disclose all information to stockholders, a competitor might gain an advantage by investing the price of one share of stock. Since the laws usually do require that all stockholders be given an annual report, containing an income statement and balance sheet, a minimum amount of information is assured. However, most state laws are lax concerning the content of these statements and the reports may confuse the stockholder who has acquired little proficiency in financial analysis. On the other hand, more and more companies, especially the large ones with many stockholders, have developed the art of presenting financial data so that the report, combined with the president's annual message to the stockholders, provides intelligible information for those who take the trouble to read it. Incidentally, an individual has only to own one share of stock to be treated as a stockholder and receive these reports as a matter of right. Most companies send annual reports free of charge to whoever requests them. Thus the annual statement of the large corporation may become a vehicle for creating good will for the corporation among stockholders, workers, and the general public.

Right to Restrain Ultra Vires Acts.—Turning now from stockholders' rights with respect to management, we come to those rights which concern the nature of the business in which the corporation may engage. Presumably the stockholder invests his money to have a share in the fortunes of a venture in a particular field. The field is described in the charter, and he

can restrain activities outside this field (ultra vires) by court action, if necessary. However, this restraint is seldom imposed, largely for the reason that modern charters are broad in scope at the outset, and directors seldom find it necessary to risk personal liability by the commission of ultra vires acts. If for some reason the charter should be too restrictive, it can easily be amended, provided the stockholders approve.

Right to Amend the Charter.—Since the charter embodies many agreements among three parties—the state, the corporation. and the stockholders—the power to amend, if unrestricted, might make it possible for the majority stockholders to deprive other stockholders of valuable rights, such as the preference to earnings or assets. To prevent this type of piracy, the common law made the distinction between those changes which were fundamental and those which were not. Nonfundamental changes, which would little affect property rights of the members, such as change of name, place of business, and number of directors, were permitted by a mere majority vote of the stockholders. Fundamental changes, such as those affecting the nature of the business and the rights of the stockholders, were possible only if approved unanimously by the stockholders. However, since unanimous consent is difficult to obtain and since this requirement encourages professional dissenters who, unless paid their price, threaten to hold up a change approved by a large majority of the stockholders, it is now common for charters to permit even fundamental changes by a two-thirds vote of the stockholders. Since this would still permit the one class of stockholders to exploit other classes, an affirmative two-thirds vote of each class affected is usually required. In some jurisdictions nonvoting stock may vote if their rights are at stake. Thus the law has avoided the rigidity of the rule of unanimous consent, but at the cost of permitting some impairment of minority rights, particularly in states where courts of equity cannot undo all of the injustices that might arise from lax corporation laws. The problem is to avoid placing the corporation in the strait jacket of unanimity without inviting the unfairness that might injure the individual stockholder if less than unanimous consent is required.1

Right to Vote in General.—Finally, some special consideration should be given to a stockholder's right that is sometimes classified separately, but is likely to be implicit in several other rights, namely, the right to vote on various matters affecting corporate policy. As we have seen, it is through this right that he exercises the control or veto power that makes him and his fellow stockholders the final and ultimate force in determining broad questions of corporate policy. Whether he exercises this power directly and intelligently or delegates it to corporate management or someone else, or simply throws it away by failing to vote, the ultimate power is his. Like the individual citizen in a democracy, he can use his franchise wisely, foolishly, or not at all—but he is the source of authority.

It is well known that not all classes of stock have equal voting power. Contrary to popular belief, however, almost all classes of stock do have certain voting rights. It is generally thought, for example, that preferred stock usually has no voting power. Yet W. H. S. Stevens, after a study of 966 listing applications for preferred issues on the New York Stock Exchange from 1885 to 1934, found that 277 had general voting power, and 602 had the power to vote on certain questions or under certain circumstances (e.g., when dividends were in arrears); only 87, or less than 10 per cent, were completely voteless.² Most common stocks have full voting power, although the nonvoting common stock craze of the 1920's has left an abundant heritage.

Like other matters, the voting power attaching to particular stock is determined largely by the charter. In the absence of specific provisions, all stock has equal voting power per share, but nearly all charters specify the voting privilege. The general rule of one vote per share on all matters still prevails for common stock, but other classes may also have some voting power.

¹For a penetrating discussion of the problem of charter amendment, see Securities and Exchange Commission, Report on the Study and Investigation of the Work, Activities, Personnel and Functions of Protective and Reorganization Committees (1938), Part VII, pp. 464-525.

²W. H. S. Stevens, "Voting Rights of Capital Stock and Shareholders," Journal of Business of the University of Chicago, October, 1938, pp. 311-348.

Reference has already been made to instances in which each share of stock has several votes per share or only a fraction of a vote per share. These instances are unusual.

A more common modification of the regular right to vote is its restriction to a limited range or to particular conditions. Much of the preferred stock now outstanding is of this type. It may usually vote on matters affecting its security, such as the issuance of preferred stocks and bonds having a prior claim to earnings and assets, and it may frequently achieve the power to elect part or all of the board of directors upon such contingencies as the failure to receive dividends for a stated period of time. The votes of the holders of a majority of each class of stock affected, rather than of a majority of all stock, are frequently required on these particular questions.

Another modification of the one-vote-per-share rule is cumulative voting, which is designed to give minority stockholders a voice proportionate to their ownership interest. This type of voting is used primarily in the election of directors. Each share of stock is given as many votes as there are offices to fill, and the minority stockholders, if they concentrate their votes wisely, can be sure of representation in approximate ratio to their holdings. This device permits the majority of stockholders to elect the majority of directors and thus control corporate policy, but it subjects them to the scrutiny of the minority directors? It is beneficial if it induces both a healthy rivalry to serve the stockholders and constant appraisal of the majority's performance, but it may produce the opposite result if bitter dissension is fostered. It affords the best technical arrangement for remedying the unfairness that inheres in statutory (share for share) voting whereby the holders of 51 per cent of the stock can elect all directors, leaving almost one-half of the stockholders unrepresented. Cumulative voting is permitted by the statutes of most states, but it is not commonly employed by corporations.

Under the common law each stockholder had one vote, regardless of the size of his stake in the enterprise. The result was that in some instances a group of individuals, whose combined investment was small, obtained control of the enterprise. For this reason statutes now provide for voting power commensurate

with stockholdings. Only in cooperatives—particularly consumers' cooperatives—does the common law principle of one vote per stockholder prevail.

Formal provisions for voting do not make much difference or have much practical effect if the stockholder does not exercise his franchise wisely. When the common law was changed to permit voting by proxy rather than in person, the way was made easy for the delegation of the right. Although the proxy is but a temporary delegation and can be rescinded at any time, its use has been repeated time after time until filling out proxy forms has become a matter of routine in the life of the average stockholder.

Even the rules of the Securities and Exchange Commission governing proxy solicitation have probably not changed matters much. These rules are made so that the stockholder will be provided with vital information concerning the corporation, its management, and the issues to be voted upon at the time he is asked to sign a proxy. He now knows how his proxy (usually the management) will vote on the issues involved, who the candidates for directorships are, what salaries they are paid by the corporation, and how many shares of stock they own. He also knows the salaries and fees paid to officers, law firms, accounting firms, and others. Financial statements must accompany or precede the proxy solicitation.

How much attention is paid to this significant information is a matter of conjecture. Certainly it should permit the stockholder to act more intelligently. However, the problem he must face, if he disapproves of management, remains the same: he must mobilize other stockholders to oust the management. Even with the help in solicitation, forced upon the corporation by Securities and Exchange Commission rules, he still has to bear the entire cost of printing and mailing, and has only the hope that his fellow dissenters will eventually help him bear the load. The directors can use their well-oiled proxy machinery to oppose his arguments and state their case—usually with corporation funds rather than their own. It is generally much easier for the stockholder to dispose of his stock than to face such a fight.

Ownership vs. Management.—The divorce of ownership from management has been emphasized by so many recent writers that there is a tendency to consider this separation a recent development which has changed the essential structure and functioning of the corporation, indeed, of economic society itself. It cannot be overemphasized that the separation of management from ownership is inherent in the corporate form and absolutely essential to its widespread use.) No one wants to own stock in a corporation in which all stockholders are managers.

A century ago John Stuart Mill observed the possible conflict of interest between management and shareholders, and the tendency of management to perpetuate itself. He wrote:

The directors of a joint-stock company, it is true, are always shareholders; but also the members of a government are invariably taxpayers; and in the case of directors, no more than in that of governments, is their proportional share of the benefits of good management, equal to the interest they may possibly have in mismanagement, even without reckoning the interest of their ease. It may be objected, that the stockholders, in their collective character, exercise a certain control over the directors, and have almost always full power to remove them from office. Practically, however, the difficulty of exercising this power is found to be so great, that it is hardly ever exercised except in cases of such flagrantly unskilful, or, at least, unsuccessful management, as would generally produce the ejection from office of managers appointed by the government.³

Whatever else the problem, at least it is not so new as to change our whole concept of private property. Like all human institutions where some men elect others to positions of trust, the corporate management structure may afford temptations for individuals so inclined to disregard their trust and enrich themselves. This has sometimes happened in the management of corporations. It has also happened in government, politics, labor unions, social groups, and even religious organizations, and it is no more inherent in one than it is in another. Whatever may be the possibilities of unfair or unethical practices, it is probably true that the overwhelming majority of corporate managements

⁸ J. S. Mill, *Principles of Political Economy* (London: 1910), Book V, Ch. XI, Sec. 11, p. 582.

are faithful to the trust they hold. If it were not so, our corporate system could not function.

Obligations of Stockholders.—Along with rights go responsibilities. The responsibilities and liabilities imposed upon stockholders by law are not very onerous, but they are definite and must be observed. 'Each stockholder is obliged to make full payment for stock to which he has subscribed. In the case of par value stock this amount is not less than par value; with no-par stock it is the agreed price. He is liable to the corporation for any unpaid balance, and creditors can sue in the name of the corporation to recover their claims. This requirement of full payment for issued stock is frequently met by paying for the stock with overvalued property or services rather than cash. As long as directors show good faith in valuing the property or services, their valuation is conclusive. Even in states following the "true value" rule, considerable latitude is given the directors in valuing property. Sometimes the promoter or his associates will receive stock for services or property. Part of this will be donated back to the corporation where it becomes treasury stock, a term applying to all of its own stock held by a corporation. The corporation can then sell the stock for any price the market will bring to raise cash for its operations. Since it has gone through the "immunity bath" by being fully paid when it was first issued, it can subsequently be sold at any price without making the holder liable. However, if the stockholder connives in the issuance of stock for grossly overvalued property or services, he may become personally liable.

Since all states now grant limited liability to most corporations, holders of fully paid stock are not subject to further liability, as they previously were under the laws of California and Minnesota. Sometimes stockholders in insolvent corporations are assessed by their own group to raise cash to restore solvency, but no stockholder can be forced to pay this against his will. He can refuse to "throw good money after bad," but he will receive no interest in the reorganized business.

Finally, dominant stockholders, whether or not they have control of the voting stock, who control the corporation through "dummy" directors are commonly held liable for fraudulent or unlawful acts committed by the corporation or its subservient management. In such cases the courts commonly reach behind the facade of the corporate fiction. New legislation, like the Securities Act of 1933, the Securities Exchange Act of 1934, and the Investment Company Act of 1940, places special responsibilities upon "controlling persons," be they stockholders or others.

Preferred Stock.—The position of preferred stock in a corporation's capital structure is commonly said to be between common stock and bonds. Its fundamental legal character is like that of common stock—both represent shares of ownership—never like bonds, which are creditors' claims. It is "preferred" over common stock in one or many respects, usually as to earnings and assets. Preferred stock appeals to investors who require greater safety than inheres in common stock and yet seek a rate of return higher than that afforded by bonds. In return for this preferred claim to earnings they usually give up the right to receive more than a fixed rate of dividend and frequently the right to vote for directors. These rights and restrictions are subject to all the embellishments and conditions that seem best to suit the needs of the particular issuing corporation, and there is no universal standard pattern.

Uses of Preferred Stock.—Historically, the general use of preferred shares has been traced back to canal companies and railroads in England, where they were used after 1825 as an emergency device to raise capital for partly completed projects that were in danger of collapse because of insufficient capital. The problem was to raise additional capital or face almost total loss. Sometimes this additional capital could be raised by assessing existing shareholders or by selling additional shares of ordinary stock. The first method usually met with shareholder resistance; the latter was often impractical because the financial crisis caused the stock to sell at a large discount from par. Additional borrowing by the use of debt instruments, such as bonds, mortgages, and promissory notes, was not feasible when companies had exceeded their statutory debt limit (commonly one-

third of the capital stock) or where the burden of fixed debt charges was already too heavy. Stock with preferences and protection sufficient to attract funds was the easiest way to meet the emergency.⁴

In the United States preferred stock has commonly been sold for cash or property as a means of raising capital economically, while avoiding the dangers of fixed charges. Many industrial companies have an uncertain earning capacity, and fixed debt charges may bring about insolvency. The issuance of preferred stock helps to avoid this danger since dividends may be omitted in poor years. If the company can employ its capital to earn a rate of return higher than the rate of dividend paid on preferred stock, the excess profits flow to the common stockholders, who profit by this "trading on the equity." The latter may even retain control of the corporation by making the preferred stock nonvoting. It has been fairly common in corporate financial practice for the preferred stockholders to put up all the money or property needed to begin operations; in many instances the common stock has been issued to promoters, bankers, and others performing the services of promotion, or given as a bonus to purchasers of preferred stock. Thus the common stock, in which control usually resides, has frequently represented little but promotional services performed and hoped-for profits.

Preferred stock has often been used in American finance as a means of reorganizing the financial structure in case of failure. A large percentage of preferred stocks in the railroad industry was originally issued to the holders in exchange for defaulted bonds or short-term debt as a means of cutting down fixed charges. The fact that they were forced upon creditors explains why most railroad preferred stocks usually have weak contractual positions, such as noncumulative dividends.

Preferred stock has also been used by public utility companies, particularly holding companies. In the banking crisis of the early 1930's national banks found preferred stock a temporary expedient for strengthening their position. These preferred

⁴ For a complete and highly valuable discussion of early preferred stocks, see G. H. Evans, Jr., British Corporation Finance: 1775-1850; A Study in Preference Shares (Baltimore: Johns Hopkins Press, 1946).

shares, previously unknown to banking finance, were sold to the Reconstruction Finance Corporation and were later largely redeemed.

Preferred Stock Provisions.—While the charter must be consulted for a complete statement of the preferences that attach to any particular preferred stock, the one universal attribute is preference to dividends over common stock. This does not mean that the dividends must be paid. Dividend payments on preferred stock, as on common stock, are subject to the discretion of the directors, who can withhold dividends indefinitely without risking insolvency. This feature, together with the absence of maturity, is the reason why preferred stock involves smaller risk of failure to the corporation, and, conversely, leaves the investor in a less secure position. If bond interest and principal are not paid according to the letter of the contract, the corporation faces receivership or bankruptcy. Preferred stockholders, on the other hand, have a right to dividends only if they are declared by directors, and courts seldom question the discretion of directors in this matter

DIVIDEND ACCUMULATIONS. To guard against failure to pay dividends, preferred stock is sometimes made *cumulative*, that is, dividends not paid in one year accumulate and must be paid in full before the common stock receives anything. Of course, dividends may accumulate for years until they amount to over 100 per cent of the par value of the stock. The depression of the 1930's left a heritage of dividend accumulations, many of which have now been liquidated, because of high profits during World War II.

Accumulated dividends are frequently extinguished by some kind of financial adjustment rather than by payment in cash. The preferred stockholder is commonly asked to take new securities—usually preferred or common stock—for his claim to past dividends, and is frequently given new preferred stock in exchange for old. Sometimes the new stock carries a lower rate of dividend than the old. For example, in November, 1936, Goodyear Tire and Rubber Company's \$7 preferred stock was in arrears to the extent of \$11.25. Under the company's recapi-

talization plan, the \$7 preferred stock, with its right to back dividends, was exchanged for new \$5 preferred plus 11/3 shares of common stock. Since the average price of common stock for the year was about \$26, and the new preferred sold for slightly above par because dividends were paid, the exchange looked attractive to the preferred stockholder. Those not wishing to make the exchange were later paid \$110 for each \$7 preferred share. The company's competitor, the B. F. Goodrich Company, was similarly recapitalized in the same year. Its 7 per cent \$100 par cumulative preferred stock, with dividends in arrears equal to \$35 a share, was retired by giving, for each old share, 1.4 shares of new \$5 cumulative preferred stock plus ½ share of nopar common stock. After equalizing the yields on the two preferred issues, it is clear that all that the stockholder received for his \$35 arrearages was ½ a share of common stock, which he might have sold in 1936 for a maximum of \$18. The new preferred stock ranged in price from 74 to 87 in 1936. However, the preferred stockholders generally accepted the plan, because it promised something which was of immediate value in the market place—the return to regular dividend declarations. This is the bait that is usually held out to preferred stockholders to get them to accept a security settlement. The management, when short of cash to pay full arrearages and anxious to place the common stock in line for dividends, can induce acceptance of such a plan by withholding dividends until the plan goes through. This practice drew a vigorous denunciation in 1937 from S.E.C. Commissioner Robert E. Healy in his dissenting opinion concerning a reorganization plan for the International Paper and Power Company. It has also led some observers to question the value of the cumulative provision.

Anyone who has lived through the last few years can hardly fail to have been impressed by the huge cash sums that have sometimes been paid by corporations to clear up arrearages. An outstanding case is the Worthington Pump and Machinery Corporation. In 1943, according to a recapitalization plan adopted two years earlier, this company paid, in cash, for stock that had not been exchanged, \$78.75 a share on Class A preferred stock and \$67.50 a share on Class B preferred stock. Although only

about 7,900 shares remained unexchanged, the cash payment was substantial. The American Woolen Company is another interesting case. It had paid regular dividends on its 7 per cent \$100 par preferred stock from 1899 to 1927. Then bad times came to the woolen and worsted industry, and the company failed to pay dividends, or paid only partial dividends, until 1940 when accumulated arrearages had reached \$74.50 per share. With wartime profits it began whittling down the accumulations; it paid dividends of \$12 in 1941, \$8 in 1942 and in 1943, \$12 in 1944. and \$16 in 1945. In 1946 it offered to exchange new 4 per cent prior preferred at the rate of 1½ shares, plus \$8.50 in cash for each old share and remaining accumulations. About three quarters of the stockholders accepted the exchange, and the others were paid \$64 a share to clear all arrearages. The company paid out \$71/3 million in preferred dividends in 1946, a considerable part of which was for accumulations. Another example is Armour and Company, which in 1946 paid dividend accumulations of \$68.25 per share and called for redemption (at \$115) its 7 per cent (\$100 par) preferred stock. What once seemed impossible was actually accomplished—and the cumulative feature has gained immensely in prestige.

NONCUMULATIVE PREFERRED STOCK. The lot of the holder of noncumulative preferred stock is not always a happy one. Once dividends are passed the right to them is lost forever. Thus his position is insecure, if the management, which usually represents the common stockholders, decides not to pay dividends. His only preference is that he must be paid one year's dividends before the common stock can receive a dividend. In times of low earnings, it is usual to cease payments on common stock and shortly afterward on noncumulative preferred. Years may go by without a dividend, and yet all the management must do to restore dividends on the common stock is to declare one year's dividend on the preferred. This, according to some observers, is an open invitation for management to withhold dividends on noncumulative preferred stock on the pretext that current earnings are needed in the business; later, when the retained earnings yield profits, management can declare the bulk

of the current profits as common stock dividends. Some observers suggest that earnings should be "christened at birth," and that if they are retained for business reasons, they should be credited to the noncumulative stockholders to the extent that they were deprived of dividends. In other words noncumulative preferred stock should have a cumulative claim to earnings retained in the business by denial of dividends. Some court decisions seem to substantiate this view. As early as 1882 a New Jersey court, in Elkins v. Camden and Atlantic R. R., 36 N. J. Eq. 539, issued an injunction preventing the payment of dividends on the common stock of the company until the 7 per cent preferred stock had received dividends to the extent earned, but not paid, in previous years. The charter made no mention of cumulative rights, setting only the upper limit of 7 per cent on preferred dividends. In 1909, another court in the same state, in Bassett v. U. S. Cast Iron Pipe and Foundry Co., 75 N.J.Eq. 539, held that management was within its rights in declaring dividends on noncumulative preferred stock out of surplus built up by withholding preferred dividends in previous years. Fifteen years later, the appellate court, in Day v. U. S. Cast Iron Pipe and Foundry Co., 96 N.J.Eq. 736, upheld an order of a lower court of equity making it obligatory on the corporation to pay dividends on the noncumulative preferred stock to the extent earned, but not paid, in past years before the common stock was entitled to dividends. Thus the New Jersey legal tradition leans strongly toward the utmost protection of noncumulative preferred stock.

However, New Jersey seems to be a singular exception to the practice in other states, where courts have tended to construe strictly the rights of preferred stock as prescribed in the charter. The prevailing rule seems to be that laid down by a Virginia court, in Norwich Water Co. v. Southern Railway Co., 11 Va. Law Reg. (N. S.) 203, to the effect that unless the state statute or corporate charter makes noncumulative preferred dividends payable directly out of earnings, the board of directors has final discretion to declare or withhold dividends. If directors do not act arbitrarily in retaining earnings for business purposes, the right to dividends not paid is lost forever. A decision in 1930

by the United States Supreme Court, in Wabash Railway Co. v. Barclay, 250 U.S. 197, involving an Indiana corporation seems to have shattered the notion that noncumulative preferred stock has a right to dividends to the extent that they are earned. Justice Holmes, speaking for the majority in reversing the decision of the appellate court, held that if dividends on noncumulative stock cannot be paid for sound business reasons, the right to dividends for the year is gone and cannot be recovered. "If the right is extended further upon some conception of policy, it is enlarged beyond the meaning of the contract and the common and reasonable understanding of men." This decision clears the air. Unless otherwise provided, management retains power to withhold dividends, a contingency which the stockholder faced and accepted when he acquired his stock.

This does not mean that noncumulative stocks are worthless. It simply means that the investor must look for protection to fundamental earning capacity and to the desire of management to continue dividends on all of its stock, rather than to contract provisions. Some noncumulative preferred stocks, like George W. Helme Company's 7 per cent and U. S. Tobacco Company's 7 per cent, have had excellent dividend records due to stable and generous earnings. Both stocks have sold at substantial premiums above par even in the worst depression years. Most noncumulative stocks have been issued by railroad companies in times of distress and their dividend records are generally unimpressive because of the unsatisfactory earnings of most railroads in lean years. Some railroads, however, have good dividend records. Both the Norfolk and Western Railway Company and the Union Pacific Railroad Company have paid the full \$4 dividend on their noncumulative preferred stocks every year since 1899. The record of the Atchison, Topeka and Santa Fe Railway Company on its 5 per cent noncumulative preferred stock has been impressive since 1900. Most railroads, however, stopped payment of preferred dividends shortly after common dividends were discontinued, particularly in 1931 and 1932, and this was reflected in a rapid melting away of their market prices. For example, Southern Railway's 5 per cent noncumulative preferred which sold almost at par value in the late 1920's dropped in price from \$80 to \$10 per share in 1931 when the dividend was discontinued. The same story could be repeated for most railroad companies, whose preferred stocks were quoted at just a little above their common stocks in depression years. Because of dividend limits, preferred stocks are sometimes quoted at lower prices than common stocks in prosperous years.

To protect their positions, the holders of cumulative and, in many cases, noncumulative preferred stock are sometimes given the right to elect some or all of the directors after dividends have been passed. This insures against arbitrary acts of the directors, but the problem of marshaling votes for a new board, concerned with the position of preferred stock, is so formidable that the same management is usually retained. Nevertheless, the latent power is no doubt a threat to a management bent on walking roughshod over the rights of the preferred stockholders.

Participation in Gains. Sometimes, in order to sell preferred stock to the public, it is necessary to "dress it up" with additional features. One special device is to offer the preferred stockholders a chance of profits beyond the stipulated rate. This may be done by providing that the preferred stock may share in profits over and above a certain specified amount, or in dividends after the common stock has received a stipulated rate. Such stock is said to be participating, and its rights to additional dividends must be explicitly detailed in the charter. Thus, the preferred stock of the A. M. Byers Company is entitled to 7 per cent (\$100 par) cumulative dividends and, after the common stock receives \$7 a share, participates equally with the common in further cash dividends and in any stock dividends. Frequently, the right to additional dividends is limited and all the residual earnings accrue to the common stock.

Another way of giving preferred stock a speculative flavor is to give it rights to acquire the common stock, either through exchange (conversion) or through purchase (by stock purchase warrants). The provisions of such a contract indicate the type of stock to be acquired, the prices to be paid for it, and the period during which the right must be exercised. Usually, a lower price is set on the common stock in the first years, and the price is

gradually raised as the years go by. If the company is prosperous, conversion rights or purchase warrants become valuable, for the market price of the stock will reflect the value of these rights. The stockholder may realize the gain by exercising the right or by selling the rights or the stock at the market price. These devices which combine speculative appeal with supposed safety are sometimes of real benefit to the stockholder. Frequently, however, they may be used to camouflage inherently weak issues.

RESTRICTIONS ON MANAGEMENT. There is a growing tendency to add an element of safety to new issues of preferred stock by imposing certain restrictions on management. Many of these restrictions resemble provisions of bond contracts and tend to make the preferred stockholder almost a creditor. An illustration is the 3½ per cent cumulative preferred stock of the Westinghouse Electric Corporation issued in 1946, which limits the management in the declaration of dividends on common stock. Dividends cannot be paid on common stock unless net assets cover the preferred stock four times and unless the current assets are at least equal to total liabilities. Moreover, the company is required, in 1953 and each year thereafter, to pay into a sinking fund an amount sufficient to retire 2 per cent of the outstanding preferred stock. The stock is callable at the option of the company at any time at a premium varying from 104 (before 1950) to 101 (after 1960). Consent of two-thirds of the preferred stockholders is necessary to authorize new preferred stock, to create new debt when tangible assets are less than twice the funded debt and preferred stock combined, to sell all the property, or to change preferred rights. Such restrictions are typical of recent issues of preferred stocks.

RIGHTS IN LIQUIDATION. Preferred stock usually receives special protection in case of liquidation. It is usual for it to have priority of claim to assets over common stock, but unless this provision is stated in the charter, preferred stock will share equally with common stock. This priority of claim may prevent a liquidation which is against the interests of the preferred stockholders, but it by no means protects them against loss. As was

previously noted, corporations are seldom liquidated until most of the liquid assets have been dribbled away to pay operating losses. When this point is reached, the claims of current creditors are likely to be larger than realizable assets, and both preferred and common stocks become worthless. Until or unless the holders of preferred stock have the power to force liquidation, which they almost never have, their protection in this regard is far from complete. If, in addition, they have no prior claim to assets, their position is even worse.

The position of the holders of the Class A stock of the Curtiss-Wright Corporation is a good example. Class A is virtually a noncumulative \$2 preferred stock, with no preference as to assets, and callable at \$40 a share. The company's business expanded tremendously during World War II and it paid its full Class A dividend each year from 1939 to 1945. In view of the uncertain future, the directors, without warning of any kind, omitted the Class A dividends on March 16, 1946; at the same time they also omitted dividends on the common stock. Yet the company held over \$100 million of net current assets at the time, as compared with less than \$10 million before the war, and the quarterly dividend on the Class A stock would have required about half a million dollars. Subsequently, the full dividend was paid but not until the damage had been done. With a company so rich in current assets the holder of the preferred stock should have felt relatively secure, but partly because of the uncertain dividend policy the market price of the Class A stock fell from 31 to 15. If the Class A stock had preference as to assets and the company was liquidated, each share of Class A stock would have been protected by about \$100 of net current assets. But since the preferred stock actually shared equally with seven times as many common shares, its equity in net current assets was only \$12 a share. Thus liquidation was not an attractive prospect to the Class A stock, however profitable it might have been for the lowpriced common stock. The sequel is interesting. A dissident group of common stockholders tried to capture management control at the annual meeting in 1948, with the intent to pay a dividend of \$7 a share on the common or to call part of it at \$14 a share by using the excess working capital. The attack was repulsed but the management declared dividends totaling \$3 a share on the common stock that had sold as low as \$5 a share during the year.

Unusual Types of Stock.-In addition to common and preferred stock, corporations have been known to issue other types. The most important of these types are deferred stock, debenture stock, and quaranteed stock. Deferred stock usually is issued at the time of promotion. It permits promoters and bankers to share in residual earnings above a stated amount. Deferred stock is commonly called promoters' shares, founders' shares, bankers' shares, or management shares. While such stock represents little or no cash or property investment, it may encroach heavily upon the earnings available to the common stock. Debenture stock is seldom used in American finance, but it is common in England where "ordinary shares" (common stock) are divided into "preferred ordinary" and "deferred ordinary" shares, the latter having the residual claim to earnings. The former is a kind of preferred stock, although ranking below "preference" shares.

Debenture stock is simply a type of preferred stock parading under a different name. It has been issued by the General Motors Corporation and E. I. du Pont de Nemours and Company. It should not be confused with debenture bonds, which are evidences of unsecured debt, or with English debenture stock, which is really a bond and may be secured.

Guaranteed stock is stock on which another corporation has guaranteed a certain rate of dividend. It is well known in railroad finance, having grown out of the practice whereby one railroad acquires control of the roadbed and facilities of another by leasing it for a long period of time. Since the lessor corporation no longer operates the property, it has no source of income for its stockholders other than the rental paid by the acquiring corporation. This rental usually takes the form of a guaranty of a certain rate of dividend on the stock of the lessor corporation; thus its stockholders have a creditor's claim against the acquiring corporation. Guaranteed dividends must be paid like any other indebtedness. Hence the guaranteed stock becomes

much like a bond in that it has a legally enforceable claim against a corporation for a certain rate of return. In addition, it continues to be a share of stock in the lessor corporation. For example, the New York Central Railroad Company guarantees a rental sufficient to pay dividends of \$50 per year on Michigan Central's stock. This dividend was paid every year during the depressed 1930's, although New York Central was unable to pay dividends on its own stock during that period. Many similar cases can be cited as evidence of the strength of guaranteed stocks, even though many guaranteed issues of weak railroads, like the New Haven, defaulted when the parent company went into bankruptcy. The guaranty is only as good as the company making it.

Classified Common Stock.—It was the fashion during the 1920's to classify common stock into Class A and Class B shares. Sometimes the Class A stock had no voting power but in other respects was similar to Class B stock. In other cases Class A stock was much like a noncumulative preferred stock, with or without prior claim to assets and without voting power. This type of issue was severely criticized as a device to deny those who take stockholders' risks a voice in the management of the company, and to concentrate control in those who wished to share risks but not control. Nonvoting common stock is now in disrepute, and the tendency is to issue either full-voting common stock or nonvoting preferred stock with protective provisions.

Par Value vs. No-Par Stock.—When New York in 1912 amended her incorporation laws to permit the issuance of no-par stock, a new epoch in finance and a never-ending controversy began. Although no-par stock is now permitted in the vast majority of the states and has become accepted and respectable, occasional criticisms of it are still heard.

One criticism is that its use impairs the protection to creditors and the public by failing to require the corporation to hold cash or property equal to the par value of the capital stock issued. This cash or property is supposed to protect the creditors, and the law does not permit it to be withdrawn by stockholders. It is sometimes thought of as a "trust fund." Where true no-par

stock is issued, most states permit the stockholders or directors to decide how much of the sales price will be credited to capital stock and paid-in surplus respectively. Since paid-in surplus may be used for various corporate purposes, it does not have to be kept intact as does capital stock. Actually the theory of the "trust fund" was not always realized in American corporate practice, even with par value stock. Stock was frequently issued at the time of promotion, in generous quantities, for overvalued property and services. In other words, property values were inflated, or intangibles (goodwill, patents, and copyrights) inserted on the asset side of the balance sheet to equal the inflation of the capital stock account on the liability side. With no-par stock, property may be exchanged for stock without overvaluing either, even if the stock is issued with a free hand. Moreover. the "trust fund" exists where no-par stock is issued, since the capital stock account, whatever its amount, may not be impaired. Sometimes corporations have changed from no-par stock to low par stock to reduce the capital stock account.

A second criticism of no-par stock is that the payment of dividends or repurchase of stock is permitted even if assets are reduced below the aggregate debt plus the stockholders' original or permanent investment, since the law requires only that capital stock (not paid-in surplus) be kept unimpaired by dividend payments. This, it is contended, permits corporate assets to be distributed to owners as dividends, thereby decreasing the protection to creditors and the public. In practice, with par value stock, the "trust fund" did not have to be kept intact. If losses or other developments reduced assets so that impairment resulted, it was usually a simple matter to cure the impairment by writing down the capital stock account. This could be done by reducing par value, by reverse-splitting the stock (e.g., issuing one new share for two old), or by inducing the stockholders to surrender part of their stock for cancellation. Each stockholder retained exactly the same proportionate interest as previously. but the impairment was removed and dividends could be paid, thus reducing the asset protection of the creditor. It is true that writing down capital stock and creating surplus is not purely an automatic process. Corporation laws are supposed to protect against this kind of dissipation of the "trust fund," but in most states few restrictions are, in fact, imposed and the creditor who depends upon the "trust fund" is likely to find it gone when he needs it most, unless he is constantly on the alert. Creditors of the corporation are likely to give much greater weight to such factors as earning power, management, and collateral than to par value and there is no conclusive evidence that no-par stock detracts from the credit rating of the issuing corporation.

A third criticism is that no-par stock is a disadvantage to the stockholders themselves since it makes possible the dilution of their equity by the sale of new stock at prices below what they paid or below book value. However, the rigidity of par value may harm rather than protect the stockholder. If par value exists and it cannot be reduced, the corporation may face a financial crisis. If it needs additional funds and it cannot sell stock at par or above, the sale of stock is precluded since sale below par makes the stock "assessable" and unmarketable. The firm must incur the risks of issuing bonds (if anyone will buy them) or going without needed capital. No-par stock meets the situation since it is flexible enough to adjust to market realities. This is not a disadvantage to existing stockholders, but the reverse. Ample protection against dilution is available when stockholders must give approval before additional stock can be sold, or where they have the pre-emptive right. If, in an unusual case, existing stockholders have neither of these protections, they may take legal action to restrain the sale of new stock at an unreasonably low price. Courts have frequently upheld the principle that the interests of existing stockholders must be protected in the sale of new stock.

Not only has no-par stock the advantage of flexibility; it is also said to be more "honest" in that it represents a share of stock for exactly what it is—a claim to an aliquot part of the benefits that flow from the operation of a business enterprise. Only by accident would its real value correspond to par value and therefore the latter is likely to be misleading. Par value is not value at all but a "price tag" with little but historical significance. The value of a share of stock lies in the expected profitability of the corporation, not in its original issue price, even assuming it was

paid for in full. And any device that invites careful consideration of these fundamentals, as no-par stock is said to do, may be superior to the nominal but not very real protection of par value. Moreover, sound business policy demands that management deal carefully with all capital invested by stockholders, whether it be accounted for by capital stock or paid-in surplus. The release from the strait jacket of par value does not imply careless and cavalier treatment of stockholders or the disregard of essential rights of creditors.

This, in broad outline, is the fundamental nature of corporate stock. Variations in stock provisions are many, and one could cite scores of individual issues having singular features. The needs of each corporation, the problems of its immediate environment, even temporary fads (like nonvoting stock) that seem to dominate the securities markets from time to time, all help to shape the contractual provisions that fix the relationship of the stockholders to the corporation and to each other.

REFERENCES FOR FURTHER READING

Buchanan, N. S. The Economics of Corporate Enterprise. (New York: Henry Holt & Co., 1940), Ch. 5.

Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book II, Chs. 4, 5.

Dodd, D. L. Stock Watering. (New York: Columbia University Press, 1930).

Evans, G. H., Jr. British Corporation Finance: 1775-1850; A Study in Preference Shares. (Baltimore: Johns Hopkins Press, 1936).

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Ch. 5.

Lincoln, E. E. Applied Business Finance, 5th ed. (New York: McGraw-Hill Book Co., Inc., 1941), Ch. 5.

Lyon, Hastings. Corporations and Their Financing. (Boston: D. C. Heath & Co., 1938), Chs. 8-14.

Wildman, J. R., and Powell, W. Capital Stock Without Par Value. (New York: A. W. Shaw & Co., 1928).

Chapter 6

CORPORATE BONDS

To raise all the capital required, corporations, like individuals, frequently resort to borrowing. As distinguished from the participation in ownership that is evidenced by stock, borrowing creates a legal relationship under which the corporation is bound to pay interest and repay the principal, and to observe all the other restrictions laid down in the contract.) If the borrowing corporation defaults on any of its promises, the lender may take legal steps to force payment. This legal compulsion is the essential difference between bonds and stock. Because the creditor is protected by these promises, he ordinarily has no power to vote for management or participate in the making of corporate decisions. He is not a fellow venturer but an outside lender, although, as we shall see, so many varieties of bonds and other credit instruments exist that they sometimes shade almost imperceptibly into a position near preferred stock.

Leaving aside, for the moment, the question of whether it is preferable to raise capital by sale of stock (equity financing) or by borrowing (debt financing), let us look at the instruments of debt through which long-term capital is commonly obtained.

Nature of Bonds.—Bonds are essentially promissory notes with provisions designed to protect the bondholder or to spell out the agreement in greater detail. The bond certificate itself is a contract between the borrowing corporation and the lending bondholder. Since convenience to the bondholder requires that the agreement be kept within the limits of a single sheet of paper, the full agreement, called the *indenture*, is placed in trust for the benefit of all bondholders. Through the medium of the trustee, usually a trust company, not only is the entire agreement kept safely, but the trustee is directly empowered to act on behalf of

the scattered bondholders to enforce the agreement. Thus the trustee becomes a third party to the typical bond contract. It is usually through the trustee that the bondholders take the steps necessary to protect their rights, although each individual bondholder may bring suit if he has not specifically surrendered that right in the indenture.

A bond indenture, like any voluntary contract, can contain any lawful provisions to which the parties agree, and it is therefore subject to many ramifications and varieties. The agreement generally covers such standard matters as the payment of principal and interest, the pledge of security (if any), protection against future issues, sinking funds or serial retirement, optional retirement before maturity, procedure in case of default, conversion or warrant privileges, the payment of taxes, and the preservation of the property through repairs, insurance, and renewals.

The promise to pay a certain sum of money at a certain time (principal) and to make periodic payments before that time (interest) constitutes the heart of the bond contract and distinguishes the bond from ownership participation. The principal is usually payable in a fixed number of dollars (\$1,000 being the standard denomination) although by agreement it could be paid in anything of value. In the 1922 inflation in Germany money lost its value and bonds were made payable in such commodities as coal, rye, and lumber. In this country greenback depreciation during the Civil War resulted in the insertion of the "gold clause" in many bond contracts, including those of the federal government. These clauses were invalidated by a resolution of Congress in 1933, prior to a 41 per cent reduction in the gold content of the dollar. This was the first instance in which the United States government defaulted on its promise to pay. The Supreme Court upheld the government, and now bond contracts are made payable in dollars rather than in gold or its equivalent.

Because the dollar fluctuates in purchasing power there has been at least one attempt to make bonds payable in a varying number of dollars according to changes in the price level. In 1925, that type of bond was issued by the Rand Kardex Company, but they have since been called for payment. The obvious

difficulties in corporate financial planning, the reluctance of investors to take smaller amounts of money in periods of low prices, and the apparent preference for fixed dollar payments by investors have all tended to discourage further use of this kind of issue despite its merit to the individual more interested in the cost of living than in a specific number of dollars.

The time at which the principal must be paid varies greatly. Bonds running for less than ten to fifteen years are usually considered short term; those over thirty years, long term. Sometimes a corporation borrows for a period of less than five years by issuing short-term notes. Occasionally it borrows on a perpetual basis, that is, the bonds never come due. This is a well-known type of bond in England, where the United Kingdom for years has issued consols. These bonds have no due date: they are a promise to pay interest forever, or until the bonds are called for payment by the government. Although such bonds are rare in this country, at least two corporations, the Lehigh Valley Railroad and the Public Service Corporation of New Jersey, have issued them. So has the Canadian Pacific Railway Company whose perpetual consolidated 4 per cent debenture stock is in reality a perpetual bond, secured by a first lien on all the company's property. But many bonds, particularly those issued by railroads and public utilities, have such remote maturities that they are virtually perpetual in substance. Examples are Northern Pacific Railway Company's 3 per cent general lien bonds, due in 2047; Union Pacific Railroad Company's 4 per cent first lien and refunding bonds, due in 2008; and American and Foreign Power Company's 5 per cent gold debenture bonds, due in 2030.

Usually the obligation to pay interest is definitely fixed. In some types of bonds the right to receive interest is contingent upon earnings. These bonds, called *income bonds* or *adjustment bonds*, often arise from past financial embarrassment and are weak contractually. Their contingent claim to interest is something like the claim of preferred stock to dividends. The difference is that the payment of interest on bonds is required if there are earnings, while dividends on preferred stock are paid at the discretion of the directors. As with preferred stock, the claim

to unpaid interest on these bonds may cumulate from year to year.

Interest rates are stated as a certain percentage of the face or par value of the bond and interest is payable annually, semi-annually, or quarterly. Ordinarily the company will fix the rate of interest so that it can sell the bonds at or near par at the time of issue. Subsequent changes in the affairs of the company or in the market rates of interest may cause the market value of the bond to rise to a premium above par or fall to a discount below par, thus affording to the new purchaser an actual yield that is less than, or more than, the nominal rate stated in the bond.

The mechanics of interest payment differ somewhat depending on whether the bonds are registered bonds or coupon bonds. In the former case interest is paid by check to the person in whose name the bond is registered on the books of the corporation. In the case of coupon bonds, the corporation does not know the names of the bondholders. Both principal and interest are payable to the bearer of the bond; hence the bond certificate has attached to it a coupon for each interest payment. When interest is due, the coupon must be clipped by the bondholder and sent to the company or its bank. Since these coupons are well recognized in financial circles, they are readily received by commercial banks which ordinarily collect them for bondholders. Bondholders can usually have their bonds in either coupon or registered form. The former type is slightly more marketable since it is easily transferred, but it involves the risk that an innocent holder may have a valid claim to it in case it is lost or stolen. The registered form is safer because title can change only at the order of the registered owner. For this reason bonds are sometimes registered as to principal, even though interest is payable by coupon.

The security that the borrowing corporation will pledge to attract investors is a matter of great importance. If the credit standing of the issuer is unquestioned, as it is with government and strong private corporations, or if the issuer would rather pay slightly higher rates of interest than pledge its property, the issue may be unsecured, or, more accurately, secured only by the general credit of the issuer. In private finance such un-secured issues are known as debentures or debenture bonds.

Issues that are secured by a pledge of specific property are known as mortgage bonds, collateral trust bonds, or equipment securities.

Mortgage Bonds.—A promise to pay that is fortified by the pledge of specific property is generally looked upon by the investor as preferable to an unsecured one. This probably arises from the notion that the threat of seizure will stimulate the debtor to pay his debts. Confidence is enhanced where tangible property such as a water supply system, a generating station, or a factory, is pledged under a mortgage. This idea is so thoroughly imbedded in financial tradition that mortgage bonds, even if secured by a second, third, or fourth lien on the property, sell better than unsecured bonds. To the uninitiated there is much in a name, but bond terminology can be most unenlightening, if not actually misleading. Mortgage bonds predominate among railroads and public utility corporations, where most of the capital is invested in durable real property and improvements whose operations are expected to repay the debt only over a long period of years. In real estate corporations, too, the mortgage bond is the standard instrument of finance. On the other hand, manufacturing and mercantile corporations issue mortgages less frequently, probably because much of their capital is relatively liquid, constantly changing in form, and not suitable for such a lien.

The mortgage or, more strictly, the note secured by the mortgage has been used so frequently in the purchase of homes and farms that its general nature is well known. The legal technicalities need not concern us here. Essentially it is a pledge or a lien securing a debt. Historically it was a conditional conveyance of property to the creditor, but courts and legislatures, in their zeal to protect the debtor, have whittled down the rights of the creditor to take the property, even in case of default. Under modern laws the creditor cannot immediately seize the property and keep it. Instead, he goes through a legal process known as foreclosure, under which the debtor usually has the right to have the pledged property sold at public sale. In most states some classes of debtors, such as farmers and homeowners,

are given the right to redeem their property one or more years after foreclosure sale by paying the debt plus interest and other charges. Corporations usually do not have the right to redeem property sold under foreclosure.

Since the mortgage is a single, integral agreement, it cannot be divided among many bondholders. Furthermore, it is a most verbose and complicated document, sometimes running over 200 printed pages. In case of default hundreds of bondholders must be mobilized. For these reasons centralization of custody and responsibility is necessary. This need is met by a trustee, usually a trust company, who holds the mortgage or deed of trust for the benefit of the bondholders and sees that the provisions of the agreement are carried out. If the corporation defaults on any of its promises, the trust agreement usually requires the trustee to notify the company of its default, and to take steps to remedy the default or to start foreclosure proceedings. The trustee's responsibilities are limited to the commitments under the trust agreement, which have frequently been reduced to a minimum to avoid liability for wrong or impulsive action.

Foreclosure may injure the corporation, and the bondholders with it. At any rate it involves expense, and trustees commonly do not undertake such legal steps until authorized by a certain percentage, usually 25 per cent, of the bondholders and until the payment of expenses is assured. In exceptional instances trustees have failed to live up to their fiduciary responsibilities because of conflicting interests growing out of their affiliations with commercial banks, underwriters, management, and others. After a long and critical investigation of trustee practices, the Securities and Exchange Commission issued a highly adverse report in 1936, condemning the lethargic actions of trustees and the use of "exculpatory clauses" in trust agreements. As a result of this report, the Trust Indenture Act, barring trustees with conflicting interests and imposing more rigorous obligations of active trusteeship, was passed in 1939.

In case of default the trustee takes action to foreclose the mortgage. But this does not entitle the bondholders to take the rails, the turbines, or the buildings pledged under the mortgage. The corporation will request the court to appoint a receiver to

conserve the assets for all the creditors. Under the revised Bankruptcy Act the company will inform the court that it is in need of reorganization and request that a trustee be appointed. Usually this request is granted and foreclosure proceedings are stopped. The corporation may continue to operate while in receivership (or trusteeship) for many years. Since the epidemic of railroad failures in the early 1930's one-third of our railroad mileage has been under the protection of the courts. During this period the bondholders have been unable to touch the property. They have been paid interest and have received the other benefits under their contracts only when the receiver and the courts have so ordered. Thus mortgage bondholders are helpless to enforce what seem to be their rights.¹

Clearly the mortgage does not provide absolute protection to the bondholder, but this does not mean that the lien is of no value. Quite the contrary. According to the "absolute priority" theory now held to rigorously by federal agencies and courts, creditors with prior claims must have such claims satisfied completely before the holders of junior claims can participate in the reorganization at all. The first mortgage bond has a priority, and when the mortgage is backed by highly valuable and strategic property the holder is likely to fare well in reorganization. On the other hand, a prior claim to property with no earning capacity (present or potential) is worthless, as many have found who have placed their trust in the word "mortgage." That is why it is vital to the investor that the property covered by the mortgage be fully known and carefully appraised.

A problem that has frequently arisen in mortgage bonds concerns the possibility of issuing additional bonds under a first mortgage. To permit more bonds would obviously facilitate future financing for the corporation—particularly if it were growing rapidly—and avoid the higher interest charges that would have to be paid if junior mortgage bonds or general credit bonds were issued. On the other hand, such additional issues would dilute the security of existing first mortgage bondholders. Sometimes the issue is "closed"—that is, no more bonds can be issued. Sometimes the issue remains "open"—

¹ For a discussion of corporate failure and reorganization see Chapter 14.

that is, more bonds can be issued under the same mortgage, but usually under conditions designed to prevent dilution. Thus new bonds might be issued only for new construction, up to 75 per cent of its cost, or they might be issued if earnings were two times the interest requirements. In some instances an upper limit is placed on the amount of future issues; in others, any amount may be issued if conditions relating to earnings are met.

Closely allied is the problem of whether or not a mortgage attaches to property built or purchased by the corporation in the future. If the mortgage is intended to cover additional property, the after-acquired property clause is inserted in the agreement. This is a common provision, and in a growing corporation it frequently causes difficulty by preventing the company from financing new construction or acquisitions by the most economical method.

Three ways of getting around this clause have developed in general practice. The first method, used frequently in the past by railroads, is to have the management organize a separate corporation to acquire or build new property, paying for it by issuing first mortgage bonds on the new property. If the property is subsequently sold to the parent company, it is already subject to a first mortgage, duly recorded, and the after-acquired property clause in the parent's mortgage attaches only as a junior lien. If the subsidiary company retains title to the property, the after-acquired property clause does not affect it, although the parent company may operate it virtually as its own. Another device is by use of the purchase money mortgage, whereby the seller of the property retains a mortgage upon it as part of the purchase price, and the buying corporation pays only for the equity above the mortgage. Since the mortgage existed at the time of acquisition, the after-acquired property clause attaches only to the equity junior to the purchase money mortgage. In both cases care must be taken to make it clear that the objective is legitimate, and not for the purpose of defrauding the bondholder. Courts have frequently nullified such arrangements on the basis of fraudulent intent. A third method of avoiding the after-acquired property clause, and one that is above legal question, is by leasing rather than owning the property. This is the device used by most railroads to finance the purchase of equipment, but it is also used for other purposes. Only if and when title passes to the lessee corporation at the end of the lease period does the clause attach to the property.

If the corporation can raise enough money to pay off the bonds, the after-acquired property clause might be removed. The same result could be obtained by inducing the bondholders to exchange their bonds for new bonds without the after-acquired property clause.

Bonds secured by iunior mortgages on physical property have frequently been issued, particularly by railroads. Since the words "second," "third," and "fourth" do not appeal to the investor, more alluring terminology is used. Names such as "general," "refunding," "improvement," and "consolidated" sound much better and seem to imply strength and growth. The position of such bonds may or may not be sound, depending upon the general profitability of the issuing company and the size of prior-lien issues. Sometimes these junior liens automatically become first liens if the first mortgage bonds are paid off and the mortgage is canceled. However, this is frequently defeated by refunding the old issue or otherwise keeping the mortgage "alive." Where corporations have a long history of growth through consolidation and separately financed construction, bond issues may have varying claims on different pieces of property a first lien on a stretch of trackage, a second lien on a larger portion, and a subsequent lien on the whole property. Separate study is needed for each bond, particularly where capital structures are complicated, as in most railroad corporations.

It may be well to add that the mortgage bondholder has two claims against the corporation. First, the bond itself, with its promise to pay interest and principal, gives him a creditor's claim against the corporation. Second, the mortgage gives him, a specific claim to specific property. If the company defaults and the specific property sells for less than the amount of the bond issue outstanding against it, the bondholder has a general creditor's claim against the company for the deficiency.

Collateral Trust Bonds.—Some corporations own intangible property (stocks, bonds, notes, leaseholds) that may be used as security for a bond issue. The collateral is pledged under a chattel mortgage and held by a trust company for the benefit of the purchaser of the bonds. Collateral trust bonds are sometimes used by a parent company to help finance subsidiary companies, which are so small and little known that their securities are not readily salable. The parent acquires the securities, pledges them as collateral, and sells a large issue of its own collateral trust bonds. These bonds have the market advantage of a well-known issue and diversified security. Both railroads and electric light and power companies have used collateral trust issues extensively to finance their subsidiaries which are chartered in each state in which operations are carried on.

During the 1920's, collateral trust bonds were frequently issued by public utility holding companies as they scrambled for operating companies to add to their systems. Common stocks thus acquired were placed in trust for bonds issued to raise money for further stock purchases. The weakness of some of these bonds was rather painfully demonstrated when the Great Depression reduced drastically the earnings of the deposited stocks and their market values. Many holding companies failed, and great losses were suffered by bondholders, who found that their bonds involved essentially the risks of common stocks.

During the same period there was a rapid development of investment companies, organized to invest the public's money in marketable securities, usually common stocks, with no attempt to control the companies whose stocks were held. A few of these companies sold bonds, secured by deposited stocks, but this was cumbersome because of frequent changes in the stocks held.

On rare occasions a corporation issues a collateral trust bond based upon its own bonds or stocks as collateral. This may make the issue somewhat more marketable. If the bonds issued are less than the par or market value of the collateral pledged, they afford a margin of protection to the investor.

Just as in the case of a mortgage bond, the bondholder may find that his rights to seize the collateral if the company defaults are defeated by the interposition of receivership or trusteeship. Furthermore, his position in case of failure will depend upon the value of each of his two claims against the corporation—the value and earning power of the deposited collateral and his claim as a general creditor of the corporation.

Equipment Trust Obligations.—A singular development in financing has been the use of the equipment trust certificate by railroads to purchase rolling stock, that is, freight cars, locomotives, coaches, etc. This type of security differs from a mortgage in that the railroad does not own the equipment. Instead, legal title to the property is vested in a trust company for the benefit of those who put up the money to purchase the equipment. The railroad company uses the equipment, much as its own, through a lease or rental agreement with the trust company.

The arrangement can best be understood by an example. Suppose that the X Railroad Company wishes to purchase rolling stock but cannot pay cash for the equipment. The company goes to the equipment manufacturer and places its order, agreeing to pay about 20 per cent of the cost out of company funds and arranging with an investment bank to raise the other 80 per cent by selling equipment trust certificates to the public. A trust company will be enlisted to take complete title to the equipment and lease it to the railroad. The title and lease are the security for the publicly held certificates. The railroad uses the equipment and pays a rental sufficient to meet the interest on the certificates and to retire a portion of them each year. At the end of the period, usually about fifteen years, all certificates have been retired and the trustee transfers title to the railroad. Meanwhile the railroad is obligated by the lease to protect the certificate holders by agreeing (1) to repair or replace damaged cars; (2) to assemble the cars at a convenient place in case of default so that they can be easily repossessed; and (3) to display a name plate designating the legal owner. If default occurs under this so-called lease or Philadelphia plan, the trustee can move at once to seize the rolling stock. There is no foreclosure and no delay. Receivership cannot stay the seizure because the railroad has no vestige of claim to the property; it belongs to the trust company for the benefit of the certificate holders. This is essentially the

underlying strength of the lease plan. The trust certificates are certificates of beneficial interest in the title to the equipment and the lease. They are neither direct credit obligations of the railroad (unless it guarantees them) nor stock. Rather, they are shares of participation in ownership and in the benefits which flow from the rental agreement.

Because no railroad can operate without rolling stock, payments to the trustee are usually made promptly. While railroads have frequently failed or defaulted on other debts, holders of equipment trust certificates have seldom sustained any loss. Even when the Great Depression sent one-third of our railroads into bankruptcy, material losses were confined to one issue of a small southern carrier. In some instances maturities were extended by receivers, but even bankrupt railroads scrupulously kept up equipment rental payments. These securities commonly sold at premiums while other railroad bonds sold at a few cents on the dollar.

Occasionally a strong railroad may purchase its equipment outright, and issue mortgage bonds upon it, but such equipment mortgage bonds are rare. Sometimes the railroad will acquire the rolling stock under a conditional sale plan rather than a lease. Since in some states the seller does not retain undisputed title to goods sold under conditional sale, the right to immediate repossession in case of default may be impaired—a risk that can be avoided by use of the lease. This accounts for the popularity of the Philadelphia plan.

Although the use of equipment obligations in this country is traced back to early canal companies, they became significant shortly after the Civil War when they were adopted by weak railroads who could procure needed equipment in no other way. Soon afterward they were adopted by the stronger roads who found that institutional investors, such as banks and insurance companies, would buy these securities at rates somewhat lower than would be required on usual railroad securities. At the present time their use has been extended to nonrailroad fields. Street railways, steamship lines, air transport companies, and even an isolated utility or manufacturing concern have used the equipment obligation for financing purposes, but not with uni-

form success. This security has been successful in the railroad field because of the essential nature of the equipment, and because the obligation is paid off before the equipment wears out. Moreover, the equipment is standardized and does not become obsolete quickly; in case of sale there is generally a good market for used standard equipment. Not all of these conditions are present in nonrailroad fields.

Unsecured Bonds.—Corporations frequently borrow by issuing bonds which have no specific security. Such a practice was once considered a sign either of extreme strength or of extreme weakness. For a long time it was felt that strong corporations, like reliable individuals, did not have to issue secured bonds because they could borrow on their bare promise to pay, and that weak corporations were forced to issue unsecured bonds because they no longer had any property left to pledge. This belief is not warranted by the facts. The type of securities issued is probably more a matter of investment tradition and custom than of strength or weakness. For some reason, known perhaps only to historians or psychologists, the American investor has insisted that the only sound securities issued by railroads or public utilities were those secured by a pledge of property—real estate, rolling stock, or securities. Yet the investor has had no hesitancy in buying unsecured bonds of sound industrial companies, and he has had no doubt that his bank would pay in full his unsecured deposit upon demand, although banks are usually more heavily in debt (to depositors) than any other class of business.

Perhaps the investor has attached too much importance to durable physical property, which is more important in railroads and public utilities than in industrial corporations; and only from bitter experience has he learned that there is no absolute protection in tangible property, particularly if it is highly specialized. If the corporation fails, it is unlikely that the assets can be sold for much or that the bondholders can operate the business more profitably than the former management. The only advantage of the mortgage is to establish priority of claim to assets and earnings, not to take property. If this prior claim to assets and earnings can be otherwise preserved, a mortgage is unnecessary.

This seems to be the logic upon which the modern unsecured bond rests. The evidence was furnished by depression experience, which found many prior liens, particularly in the railroad industry, in default of interest or principal, while many unsecured industrial bonds continued to be sound investments because their issuers possessed the golden ingredient of security—earning power.

The procedure for issuing unsecured bonds is much like that for secured bonds. The complete bond contract, or indenture, is placed with a trust company for the benefit of all bondholders, and the bond certificate sets forth only the essentials of the agreement. Bonds may be in coupon or registered form, short or long term, callable or noncallable. The trustee is charged with protecting the interests of the bondholders. In case of default he is expected to bring suit against the issuing corporation, secure a judgment, and proceed to seize the corporate property to satisfy the debt. In practice these steps are likely to be halted before the property is actually seized since the defaulting corporation usually applies for receivership or reorganization in bankruptcy under protection of the courts. Contrary to popular opinion, general creditors can, by legal process, take a corporation's property to satisfy debts. However, the procedure is different from that involved in mortgage foreclosure.

Debenture Bonds.—Debenture bonds are frequently issued by industrial corporations which borrow for long periods of time. Since such corporations seldom have mortgage bonds with prior claims outstanding and the indenture contains many protective provisions, debenture bonds may have a high investment standing—higher than some junior, or even senior, mortgage bonds of railroad corporations. On the other hand, railroad and public utility corporations usually find that it is advantageous to have at least one issue of mortgage bonds outstanding. If they also issue debenture bonds, it is obvious that these would have an inferior claim upon assets and earnings and would involve considerable risk.

Industrial corporations commonly covenant in the indenture to protect the priority of the debenture's claim to assets and

earnings either by agreeing not to issue bonds having a prior lien, or, if such bonds are issued, by securing the debenture bonds ratably. Sometimes the debenture bonds have the right to veto any proposed issue having prior claim. These provisions, although helpful, do not give full protection to the debenture bondholder unless the contract also restricts current indebtedness. Many bondholders have had their position impaired by the creation of a large floating debt to tide a corporation over an emergency. If the company finally fails, this floating debt will share in the depleted security and the bondholders will lose most of their money. Yet many debenture bond contracts do not restrict current borrowing, but give management a free hand in this regard. This is particularly true of the bonds issued before 1920. Of course the same result will flow from the unrestricted issue of debenture bonds, and indentures sometimes avoid this danger by restricting future issues of debentures.

Another protective provision commonly found is the requirement of a certain net current asset position. A company may agree not to reduce net current assets below a stated figure, or below the amount of the bond issue or a multiple thereof. This not only helps to insure the continued solvency of the company but prevents the dissipation of liquid assets by unwise dividend or stock repurchase policies during the life of the bond.

Relatively short maturities, sinking fund requirements, or serial maturities may afford additional protection. It must be recognized, however, that unduly restrictive provisions may defeat their purpose. If a corporation is denied a measure of flexibility in its financial arrangements, a financial crisis may be precipitated in which the debenture bondholders, along with others, will suffer.

Guaranteed Bonds.—Sometimes a corporation obligates itself to pay on securities issued by another corporation. We have already seen how a corporation leasing and operating another company's property enters into a contract with it guaranteeing the lessor a certain rate of dividend on its stock. Thus arises guaranteed stock, which is very common in railroad circles. In this event the stockholder has a general credit claim against the

guarantor corporation, as well as his rights as a stockholder in the original corporation.

Guaranteed bonds arise under similar circumstances. Under a special contract of guaranty, one corporation undertakes certain obligations (usually to pay principal, interest, and sinking fund) to the holder of bonds of the lessor company. The bondholder has, in effect, the benefit of two debt obligations: first, a claim (secured or unsecured) against the original corporation, and second, a claim against the general credit of the guaranteeing corporation. Sometimes each of these claims has a substantial value. In other cases the property of the two corporations comes to be so inextricably bound up in a single enterprise, for example, a railroad, that one or the other adds little. Although "guaranteed bonds" or "guaranteed stock" are impressive sounding names, investors have lost heavily on such securities when the earning power of the corporation has vanished.

Joint Bonds.—Sometimes bonds are guaranteed by more than one corporation. They are then known as joint bonds. Their most common use is to finance special-purpose projects used by several corporations. Most railroad terminals and bridges are financed by means of joint bonds. Ordinarily a special corporation, organized for this purpose, proceeds to issue mortgage bonds secured by the property. But the corporation has no credit standing of its own, since its property is valuable only if used for the special purpose. The corporations using the property place their credit behind the project by jointly and severally guaranteeing the bonds.

Assumed Bonds.—A final situation in which one corporation undertakes to fulfill the obligation of another corporation occurs when two corporations are merged or consolidated and the property is taken over, subject to the bonds outstanding, by the surviving corporation. Here no separate contract of guaranty is negotiated. The surviving corporation simply steps into the shoes of the issuer and assumes all its obligations as spelled out in the original bond contract. Thus the bonds are known as assumed bonds. Many railroad bonds have been assumed by a succession of corporations, each of which failed and gave way to

a new one in reorganization. Of course only bonds that are undisturbed in the reorganization retain their identity. Others are exchanged for new bonds or stock.

Income Bonds.—Income bonds combine an unqualified promise to pay principal, usually at a remote date, with a promise to pay interest only if earned. The bond may or may not be secured by a mortgage, but it is classed as an unsecured bond because failure to pay interest does not constitute a default. This contractual weakness is explained by their origin—financial failure and reorganization. Income bonds arose from the need to reduce fixed interest charges and yet give the semblance of a bond to the bondholders called upon to make the sacrifice. Thus they are sometimes called adjustment bonds. Occasionally an industrial corporation may issue this type of bond rather than preferred stock to raise new capital, but such cases are rare.

Investment bankers prefer to sell out-and-out preferred stock rather than court possible disfavor with investors who may misunderstand the conditional nature of income bonds. However, the advantages of income bonds over preferred stock to the corporation and the investor may be such as to make them superior for certain purposes. Although interest payments are contingent upon adequate earnings and although the determination of net earnings is subject to human judgment concerning the adequacy of depreciation, the nature and extent of repairs, and the size of needed reserves, it is not easy to hide large earnings. If the bond agreement requires that interest be paid when earned, the likelihood of its being paid is greater than if such payments are discretionary with management, as is the case with preferred stock and some income bonds.

The cumulative feature in recent issues also is some protection against arbitrary management decisions. Then, too, the bondholder has the protection of a definite promise to pay a sum on a certain date; this makes him a creditor of the corporation, not a part owner. In case of failure this promise to pay carries with it priority to assets over all stock, a priority that may be further strengthened by a mortgage. Of course this does not assure against loss, but under the present official doctrine of absolute

priority it means that income bondholders make sacrifices only after all stockholders have lost everything.

A new force which may cause the wide substitution of income bonds for preferred stocks is the tax advantage which they hold. Interest on bonds is deductible from income in the computation of federal and state corporate income taxes; dividends on stock usually are not. Of course care has to be taken to make the payments sufficiently definite that they are construed as interest rather than dividends. If this results in substantial tax reductions, the reluctance of most corporate managements to incur debt may be overcome, and debt financing—with income bonds, if necessary—may become increasingly popular and profitable.

An advantage of income bonds over preferred stock that accounts for their frequent use in reorganization is that they are more acceptable to such institutional investors as savings banks and insurance companies. Under the law these institutions are ordinarily not permitted to own stocks for more than a limited period of time, but they may hold bonds indefinitely. Hence their representatives on committees to reorganize failed corporations usually insist on income bonds rather than preferred stocks.

It must be remembered that preferred stocks and income bonds have similarities as well as differences. Fundamentally they are similar in their economic nature. The soundness of both rests more upon the ability of the issuing corporation to operate profitably rather than upon legal verbiage. That is why income bonds may be a very sound investment or a very unsound one. The Atchison, Topeka and Santa Fe has consistently paid interest on its income bonds since its reorganization decades ago. Thus the contractual weakness of income bonds may be overcome by economic strength.

Receivers' Certificates.—Technically, receivers' certificates, or trustees' certificates, are obligations not of corporations but of receivers or trustees who, with the consent of the court, sell these securities to raise operating capital for corporations undergoing reorganization. They are used for temporary financing and are usually of short duration. Ordinarily the certificates are redeemed in cash when the corporation is released from receiver-

ship. Where certificate holders cannot be repaid in cash, the court usually insists that they be given securities having some priority of claim, on the ground that the holders benefited all creditors by supplying vitally needed capital to preserve the value of the business as a going concern. Despite their strong position they have not been popular with investors, largely because cash is not always available when the certificates become due, and maturities must be extended.

Other Bond Provisions.—It is well to recognize that bonds cannot always be forced into standardized compartments. For example, although one of the characteristics of a bond is the right to receive only a fixed rate of interest, certain devices, such as the conversion feature, the attachment of rights to buy common stock at stipulated prices (warrants), or the direct right to participate in profits, give the bond a common stock flavor. Thus two desirable but possibly incompatible investment objectives, safety and speculative appeal, are wedded in one security. Moreover, there is an increased tendency to regard the bondholder as a fellow venturer, rather than as an outsider who is amply protected by the terms of a contract. Experience has shown that if the venture fails, the great majority of bondholders invariably lose. Hence some groups, encouraged by the Securities and Exchange Commission, are urging that bondholders have some voice in management when default occurs or threatens. Some day the power of bondholders to vote may not be so consistently absent as it has been in the past, and equitable controls over the actions of corporate managements, trustees, and bankers may supplement and modify the letter of the indenture.

Relative Investment Merits of Common Stocks, Preferred Stocks, and Bonds.—Since 1920 there has been a continuing controversy about the relative investment merits of common stocks, preferred stocks, and bonds. Long and ponderous statistical investigations of the results of hypothetical investments in various lists of stocks and bonds, chosen at random or by some criterion, over a period of years, have been undertaken to buttress arguments based on general observation.

THEORETICAL ADVANTAGES AND DISADVANTAGES. theoretical arguments are simple. Bonds, it is said, possess the assurance that attaches to a legally binding promise to pay a certain sum in dollars at a certain time, and smaller amounts in dollars periodically until that time. This gives a definiteness that shares of ownership cannot have. Stocks never come due: the stockholder has no legally enforceable promise to receive periodic payments; in liquidation he gets only what is left after all outside claims are paid in full; thus he must depend upon the vagaries of a fluctuating market to recover his investment. Stocks are inherently uncertain, and the market reflects this in violent swings upward and downward in response to every actual or imagined change in business conditions and speculative sentiment. On these grounds, many would rule stocks, particularly common stocks, out of the investment category. Preferred stocks may be somewhat sounder because of various priorities over common stocks but the difference is of degree, not of kind.

Closer examination of theoretical advantages and disadvantages of the different types of issues leads to somewhat different conclusions. The bond's legally enforceable claim to a certain number of dollars might be just what is desired by such investors as banks and insurance companies which hold these investments against claims (of depositors and policyholders) payable in dollars. But what about the individual investor, who is not interested in dollars as much as he is in what a dollar will buy? He needs a larger dollar income when commodity prices are rising, and he is just as well off with fewer dollars when prices are falling. Irving Fisher has called attention to the fact that common stocks, being residual equities in property, tend to vary in income and market price directly with commodity prices.2 The doubling of commodity prices during and after World War I caused great concern over the high cost of living and the low purchasing power of the dollar. In such times investment in bonds, with their fixed dollar income and principal, is a sure way of losing real income, even though the bond obligations are observed to the letter. Of course this would work in reverse in

² Irving Fisher, How to Invest When Prices Are Rising (Scranton, Pa.: G. L. Sumner & Co., 1912).

times of falling commodity prices. The real income and principal of bonds would rise in such periods, and the bondholder would gain. An investment in bonds by the individual would therefore be safe and profitable only if commodity prices failed to rise. Falling interest rates would result in an increase in the prices of outstanding bonds and would bring capital gains to the holder of long-term bonds. Rising interest rates would bring capital losses. In short, a bond has a more secure legal position, but because of its fixed payment the bondholder is subject to the vicissitudes of fluctuating commodity prices and interest rates. Extreme inflation can make worthless the most scrupulously observed fixed promises to pay, as bondholders and other creditors found in Germany after World War I.

From the viewpoint of purchasing power, preferred stocks theoretically have the same disadvantages as bonds, because their dividends are limited in amount. Moreover, since they represent shares of ownership, they do not have the soundness of a specific promise to pay. In short, they have the weaknesses of both common stocks and bonds, without the advantages of either. They are shares of ownership without a chance to participate in the gains of prosperity or growth; they have a limited claim to assets, and this claim is frequently worthless because they are junior to all creditors. They carry large possibilities of loss and very limited possibilities of gain. As with bonds, their holders may gain in times of falling prices and falling interest rates, but these conditions usually prevail only in times of economic depression, bringing unprofitable operations to most corporations and an epidemic of dividend suspensions on preferred stocks.

RESULTS OF STATISTICAL STUDIES. So much for the theories. What do the facts show about investment advantages and disadvantages of the three types of securities? Many statistical studies were made during the long bull market in stocks in the 1920's. A few studies were also made in the depressed 1930's, a period of wide swings in economic conditions and security price fluctuations and therefore a severe test for any theory.

A full account of these factual findings would require much

more space than is appropriate here. A brief summary will reveal the nature of the conclusions reached in the more important studies. In 1941, G. W. Edwards ⁸ completed a most comprehensive study of all bond issues—several thousand in number outstanding in 1937. He found that nearly one-fourth of them were in default, that interest requirements had been covered only 1.7 times by earnings during the ten years preceding 1937 and that market prices of over two-thirds of them had fluctuated by more than 30 per cent. Granting that economic changes in this ten-year period were extreme, it is clear that a cross section of outstanding bonds gave something far less than absolute security to their holders.

This is corroborated by a comparison of market prices of bonds in the prosperity years of the late 1920's with their prices at the bottom of the depression in the early 1930's. The Dow-Jones average of forty representative bonds fell in price from 99 in 1928 to 67 in 1932. Even United States Treasury 3's, issued at par in August, 1931, had dropped to 83 by the end of the year. All corporate bonds listed on the New York Stock Exchange fell from an average of 97 per cent of par in January, 1929, to 75 per cent in March, 1933.4 All listed corporate bonds fell in value 45 per cent from their high prices in 1929 to their low prices in 1932. (However, preferred and common stocks did much worse, losing 70 per cent and 88 per cent respectively.) Even a high investment rating by the country's four leading investment services was no absolute protection against market loss in bonds held from 1929 to 1932. Gilbert Harold 5 found that during this period the bonds rated highest (Aaa, A1+, etc.) by the services fell, on the average, about 20 per cent in value, while lower-rated bonds (Baa, B+, etc.) fell over 50 per cent. Individual bonds in each group fell as much as 80 per cent and 95 per cent respectively. This was, of course, a time of almost unprecedented severity, but it does emphasize the fact

⁸ G. W. Edwards, Structure and Valuation of Corporate Bonds (an unpublished study, 1941).
⁴ Benjamin Graham and D. L. Dodd, Security Analysis, 2nd ed. (New York: McGraw-Hill Book Co., Inc., 1940), p. 184.
⁵ Gilbert Harold, Bond Ratings as an Investment Guide (New York: The Ronald Press Co., 1938), p. 99.

that all investments have some degree of market risk. In whole areas of economic activity, bonds proved to be unsound investments. The worst record was made by real estate bonds, which were usually secured by a mortgage and frequently guaranteed by an insurance company. In 1935, it was estimated that 87 per cent of the real estate issues outstanding were in default of interest, principal, or sinking fund, or all three. Foreign bonds, particularly those issued by the countries of South America and southern and eastern Europe, had a similar dismal record. Junior railroad bonds and thinly protected bonds of pyramided utility holding companies were also depression casualties. On the other hand, individual bonds showed remarkable stability in value. For example, General Electric Company's 3½ per cent debentures of 1942 rose in price from 94 to 96 during 1930, and from 93 to 103 in the depression year 1932.

Preferred stocks as a class have not shown up well in statistical investigations. A. S. Dewing ⁶ analyzed the investment results of 607 industrial preferred stocks issued between 1915 and 1920. On the average, the 537 issues for which quotations were available had lost 30 per cent of their value by 1923, and 173 issues lost 75 per cent or more of their original issue price. A broadened study covering 1,477 industrial preferred issues brought out from 1880 to 1920 showed similar investment results. As of 1923, the issues which originally sold for \$4.8 billion had a market value of \$3.7 billion, a loss of about one-fourth. Nearly a third of the issues had fallen to \$25 a share by 1923. Although this is rather ancient history the above results are worth noting.

If we measure investment performance of preferred stocks by the depression-bred changes in market prices, their weakness is evident. All preferred issues listed on the New York Stock Exchange fell in value from 85 in 1929 to 25 in 1932—a drop of 70 per cent in three years against a 45 per cent decline in bonds and an 88 per cent decline in common stocks. United States government bonds declined only 2 per cent. This evidence of investment quality is certainly not reassuring.

^e A. S. Dewing, *The Financial Policy of Corporations*, 4th ed. (New York: The Ronald Press Co., 1941), Vol. I, p. 168.

Common stocks, as would be expected, show highly variable investment results. It is easy to demonstrate their superiority if they are "bought cheap and sold dear." It is equally easy to demonstrate their total lack of merit if the investor is unfortunate enough to do the reverse. Many indexes and averages are used to measure the trend of common stock prices, but a few selected figures will provide perspective. It has already been noted that representative common stocks lost 88 per cent of their values from the highs of 1929 to the lows of 1932. If a longer perspective is desired, it can be sketched briefly as follows: From 1914 to 1923, the prices of industrial stocks, as measured by the Dow-Jones average, fluctuated between 60 and 120. Then began a gradual and steady rise that culminated in the pre-panic 1929 high of 381. Market values then melted away, reaching a low of 41 in 1932. Then followed a recovery to 110 by 1934, a continued climb to 194 in 1937, a sharp drop to 99 in 1938, a recovery to 158 in the same year, and a gradual decline to 93 in 1942. From that point there was a four-year increase in stock prices to a new high of 213 in May, 1946, followed by a sharp break to 163 several months later, and a year of fluctuation at the 170-190 level. It is obvious that if stability in market price is desired, the average common stock does not measure up. Many have classed them as speculations rather than investments because of this prince-or-pauper quality. For a long time it was generally held that they inevitably involved a gamble on market trends—something no one is able to predict with any degree of accuracy.

But beginning in 1920, a number of students began to sharpen their pencils to measure actual investment experience in common stocks over the years. Their results are the second line of evidence we shall briefly consider. Their method was to assume that an investor had bought a diversified group of common stocks on a given date and held them for a period of years. All dividends received during the interval were noted and market values at the end of the period determined (corrected of course for split-ups and stock dividends). Then the total investment result was computed by adding the capital gain or loss to the dividends received. For comparative purposes it was usually assumed that a like

amount of money had originally been invested in preferred stocks or bonds, and similar investment results were computed. Stocks for most of the tests were chosen at random, since it is obvious that one can prove any investment thesis if he is permitted to hand-pick his securities. A cross section was sought, but probably not perfectly achieved in every test.

In the pioneer study, Edgar L. Smith 7 found that in eleven out of twelve comparisons between common stocks and highgrade bonds, stocks were superior investments. Investments were assumed to be made for periods varying from seventeen to twenty-two years, beginning as far back as 1866 and ending in 1922. On an original investment of \$10,000 the superiority of common stocks over bonds ranged from \$3,330 to \$21,955. In one case bonds showed a superiority of \$1,012.

Some of the studies were carried down to 1931 and 1932 to test Smith's conclusions in a time of severe economic depression and low stock prices. In every case, common stocks, bought in 1901, showed better results than high-grade bonds, although in two of the four continuation studies small capital losses were shown. The superiority of common stocks here rested on the fact that dividends paid during the period far outdistanced the 4 per cent return on bonds; the extra return more than compensated for the decline in market value at the time of the depression lows.

In a somewhat similar series of comparisons running between 1873 and 1924, K. S. Van Strum 8 found common stocks superior to bonds in sixteen out of eighteen comparisons. Dwight C. Rose 9 found that of the twenty-five largest fire insurance companies, those investing most heavily in common stocks had decidedly the better investment results. He found that industrial stock: values, based on the Dow-Jones averages, had grown at the compound annual rate of 7.8 per cent and railroad stocks at 2.8 per cent in the period 1901-28. During the same period

⁷ Edgar L. Smith, Common Stocks as Long Term Investments (New York: The Macmillan Co., 1928), p. 20.

⁸ K. S. Van Strum, Investment in Purchasing Power (Boston: Barron's, 1926), pp. 14-26.

⁹ Dwight C. Rose, A Scientific Approach to Investment Management (New York: Harper & Bros., 1928), p. 112.

the trend of bond values was slightly downward. Such impressive findings could hardly escape notice and the "common stock theory" of investment was born. This theory that common stocks are superior to bonds as long-term investments grew more convincing as the stock market boom of the late 1920's seemed to demonstrate its practical validity. The slump following 1929 is another story.

A number of statistical comparisons between the results of investment in preferred stocks and common stocks have also been made. In a broad study covering common and preferred issues listed on stock exchanges in the United States, for the period 1887 to 1925, J. R. Jackson ¹⁰ found that in eighteen of the thirty-nine years preferred stocks showed a greater relative gain in capital value and income, or a smaller relative loss, than did common stocks. He found that both common and preferred stocks suffered in poor years and revived in good years, and that preferred dividends were discontinued in poor years about as soon as common dividends were. However, preferred stocks were more stable in price and did not gain as much in market price in good years as did common stocks. This tendency of common stocks to outpace preferred stocks in good years placed their cumulative values on higher and higher plateaus above preferred stocks, so that between 1886 and 1925 a long-term holding of common stocks would have been more than twice as profitable as preferred stocks.

R. G. Rodkey ¹¹ made a series of significant comparisons between investments in bonds, preferred stocks, and common stocks, beginning in 1908, a depression year, and ending in 1932, a severe depression year. His purpose was to test the qualities of preferred stocks as long-term investments. Contrary to most a priori conclusions, he found that preferred stocks of corporations having no bonds outstanding have been good investments. More significant for our purposes are his findings as to the comparative merits of the three types of securities. In all six tests

¹⁰ J. R. Jackson, "Common and Preferred Stocks as Investments," *Journal of Business of the University of Chicago*, July and October, 1928, pp. 294-323, 397-416.

¹¹ R. G. Rodkey, Preferred Stocks as Long-Term Investments (Ann Arbor: University of Michigan, 1932).

made, common stocks were superior to preferred stocks. In the two tests involving bonds, common stocks were superior to both bonds and preferred stocks, sometimes very much superior. Significantly, Badger and Guthmann 12 have shown that if 1910 rather than 1908 had been used as the base year, all three classes would have shown large capital losses, but bonds would have been superior to both preferred and common stocks, and the latter would have had about the same investment results.

Enough has been said to show the general nature and results of these factual or statistical studies. Obviously the results depend partly upon the securities chosen and the period of time used, but in general these studies indicate the profitableness of a long-term investment in common stocks of leading companies, at least for the period up to the 1930's. A close study of the data will show the extreme hazard of buying such stocks in periods of inflated prices, such as 1928 and 1929.

Contrary Evidence.—Before concluding, it is well to present contrary evidence of a factual nature. Several studies have found common stocks to be unsatisfactory investments over the years. One study showed that if twenty-two stocks of leading industrial and railroad corporations had been purchased in 1901 and sold in 1920, the result would have been a capital loss of about half of the sum invested and an average dividend yield of about 6 per cent. In another study, which aimed at a complete picture of investment experience rather than that of a selected list of stocks or bonds, price changes of all stocks and bonds listed on the New York Stock Exchange in both 1922 and 1933 were noted, with corrections for stock dividends and split-ups. 18 At both dates, business and stock prices were in depression, more severely so in 1933 than in 1922. It was found that the 931 bonds sustained a slight average loss (0.4 per cent) between the two dates, 152 preferred stocks lost over one-third (36.5 per cent) of their value, while 341 common stocks suffered a loss

R. E. Badger and H. G. Guthmann, Investment Principles and Practices,
 3rd ed. (New York: Prentice-Hall, Inc., 1941), p. 260.
 H. Dudley Kellogg and Radcliffe E. Kilbourne, "Bonds Generally More Satisfactory Than Stocks as Long-Term Investments," Annalist, February 9, 1934, p. 254.

of one-fourth. (25.6 per cent). During this period bonds appeared to be the best investment and preferred stocks the worst. The results of this study are significant because of its broad coverage, but it has one serious drawback: it failed to take into account the differences in income received on the three kinds of securities during the period, and therefore the evidence is incomplete. Since in virtually every statistical study, the income on common stocks far exceeded that of bonds or preferred stocks over a period of years, it is entirely possible that the extra income received on the common stocks over the eleven years would have more than wiped out the 25.6 per cent capital loss. If this were done, then common stock may well have had the best investment record. The showing of preferred stocks probably would have been improved somewhat if income, as well as changes in market price, had been considered, but since preferred dividends are limited it is unlikely that their dismal performance would have been much improved.

It would be interesting to try to explain these statistical results, but that has been done elsewhere. The seeming paradox is challenging: How and why did common stocks, representing only a residual claim to assets and earnings, and fluctuating wildly in market price, have such an impressive long-term investment performance, even in depression years? The answer, derived from an analysis of the statistical studies, seems to be that the residual claim is sometimes very valuable because it is unlimited, and that most of these studies somehow contained a few "winners" (corporations whose stocks have shown remarkable profitability) whose market prices and income gains were so large as to offset the mediocre or unsatisfactory performance of other stocks in the list.

The risk of loss in any single stock is very great, but a diversified list of stocks of corporations in essential industries appears, on the average, to have grown in value if held over a long period of time. At least this has been true in the past. Why? Many reasons have been advanced, but most of them link rising stock

¹⁴ For a more complete analysis of the investigations and the reasons advanced for rising common stock values, see Chelcie C. Bosland, *The Common Stock Theory of Investment* (New York: The Ronald Press Co., 1937).

values with the steady increase in economic well-being that was characteristic of American economic life up to the 1930's. Specific causes mentioned in the studies are population growth, business expansion, corporate growth through reinvested earnings, rising commodity prices, popular support of inflationary policies, improved corporate management, more accurate and complete investment information, and falling interest rates. Most of these, of course, spell increased earnings and dividends for typical business units, and these increases flow to the common stock, not to bonds or preferred stocks with their fixed claims.

This rather lengthy discussion will provide a background helpful to the student of corporate securities. It is essentially history—few statistical studies have been made in the last decade —not a guide to present-day investment policy. Events since 1930 have not been so favorable to holders of common stocks. They have been greatly affected by these forces: high and double corporate taxation; burdensome labor policies; widespread attacks on corporation profits by politicians, labor leaders, and some economists: the depression-bred belief that the American economy is stagnating; the economic dislocations resulting from World War II: and the world tendencies toward socialism or communism. Investors in bonds and preferred stocks are affected by the same developments, but less immediately. They are less likely to suffer heavy losses from adverse economic and political developments, and less likely to gain from favorable ones.

REFERENCES FOR FURTHER READING

Badger, R. E., and Guthmann, H. G. Investment Principles and Practices. 3rd ed. (New York: Prentice-Hall, Inc., 1941), Chs. 6-9.

Bosland, Chelcie C. The Common Stock Theory of Investment. (New York: The Ronald Press Co., 1937).

Burtchett, F. F. Corporation Finance. (New York: Harper & Bros., 1934), Chs. 7-12.

Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book I, Chs. 8-11.
Gerstenberg, C. W. Financial Organization and Management, 2nd rev. ed.

(New York: Prentice-Hall, Inc., 1939), Chs. 14, 17.

Graham, Benjamin, and Dodd, D. L. Security Analysis, 2nd ed. (New York: McGraw-Hill Book Co., Inc., 1940), Chs. 6-30.

Hoagland, H. E. Corporation Finance, 3rd ed. (New York: McGraw-Hill Book Co., Inc., 1947), Chs. 10-16.

Husband W. H., and Dockeray, J. C. Modern Corporation Finance, rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Chs. 8-10.

Lyon, Hastings. Corporations and Their Financing. (Boston: D. C. Heath & Co., 1938), Chs. 15-23.

Chapter 7

PROMOTION AND THE FINANCIAL PLAN

Promotion.—The corporate management that wishes to raise capital, either for an entirely new enterprise or to expand the operations of an established concern, will face the same general kind of problem. In either event it is likely to rely on the investment banker for advice. In new projects the promoter, when he approaches the banker, will be armed with his plan of procedure and as much evidence as he can procure of the feasibility and profitability of his project. He may have spent days, weeks, months, or even years in the preliminary stages of promotion. The first step is to perceive the opportunity, whether it be the manufacture and sale of a new type bobby pin, a new device for radiant heating, or an around-the-world air line.

The next step is to analyze the possibilities of the venture; here the promoter estimates costs, selling prices, and volume of sales, and appraises possible difficulties of a technical, legal, or business nature. He may have to obtain patent or copyright privileges, options on property, or permits from government agencies. Sales outlets might be surveyed or established. Engineering, legal, and accounting services may have to be paid for. One can think of an almost endless variety of details that must attend this second step in the process of promotion. Needless to say, many projects are given up as unpromising or impractical at this stage, but the typical promoter has the make-up of a zealot rather than that of a cool and impartial philosopher. His eye sees a vein of gold not visible to anyone else in the distant hills. He spends his time and money to stake a claim. He may strike it rich or lose what he has ventured.

The third step in the process is to strive to enlist the aid of the banker whose services are needed to advance the project. Without an assured supply of funds, the promotion terminates in a heap of shattered plans and unfinished transactions. Thus the banker, through whose efforts the enterprise appeals to the investing public for funds, holds the power to veto the project, a power which he frequently exercises even though it means foregoing commissions on security sales and reduces his volume of business. In his role as a sifter of projects that come before him, the banker has an important economic function to perform, for his judgment and presumed conservatism not only protect the investor but prevent society's liquid capital from being wasted through uneconomic or, worse yet, fraudulent projects. In this role he is no paragon, whose judgment is always sound. Sometimes, he may become blinded by overoptimism or the desire for temporary gain, as is unfortunately too often true in periods of high prosperity. In general, however, he does as competent a job as can be done by fallible human beings.

The initiative, enthusiasm, imagination, and optimism of the promoter, which are so useful and necessary in seeking out new and improved ways of satisfying human wants and in providing the dynamic element that is characteristic of an individual enterprise economy, must be counterbalanced by the critical judgment and restraint of the banker who risks his most valuable stock in trade—his reputation—on each issue he sells or recommends to his clients.

If the banker refuses to undertake the job of financing the concern, the promoter will usually try other bankers or dealers, or finally give up the project. One banker might accept a project rejected by another, since some bankers tend to specialize in the securities of certain types of enterprise. However, it is well known that the quality of bankers varies widely. There are no specific standards that must be lived up to, as in commercial banking. Almost anyone with a little capital can rent an office and go into the securities business. Therefore, there is always a low-quality fringe that may take highly speculative issues which have failed to pass the critical scrutiny of older and better established concerns. This competition is healthy and socially desirable since it prevents a few banks from holding all the keys to the savings of the people. In the past, however, some concerns often resorted to questionable methods of selling to un-

informed small savers who should not have taken the risks involved. This house-to-house peddling was costly and correspondingly high commissions were charged; in many instances the new enterprise was left with only a small amount of capital and a large issue of outstanding securities. Worse still, many of the selling schemes involved downright fraud, although the Securities Act of 1933 put a stop to some of the most reprehensible practices. One of the great problems of financial regulation is to distinguish between issues that are fraudulent and contrary to the public interest, and those which are legitimate but so highly speculative that loss to investors is possible or even probable. On pages 223–227 this problem is discussed at greater length.

Let us suppose that the project requiring financing passes the scrutiny of the investment banker. His job has just begun, even though for the promoter half the battle is won. This brings us to the fourth stage in promotion: the drafting of the financial plan.

Drafting the Financial Plan: Capital Requirements.—In the first place, there must be a survey of the capital needs of the business. Usually, requirements are divided into two classes: fixed capital and working capital. Fixed capital consists of land, buildings, machinery, fixtures, or other property that is permanently committed to the business. It changes form slowly, if at all, and cannot be converted into cash, except through the slow accretion of depreciation allowances, without liquidation of the business. This type of capital returns itself to the investor only through profitable operations over a long period of time. Fixed capital is usually highly specialized and, if the business does not earn a profit, these assets cannot be disposed of except at a great loss in value.

On the other hand, a firm must have assets in the form of working capital, or circulating capital. These assets are constantly changing in form as individual items. At least a minimum amount of this type of capital is permanently committed to the enterprise and, like fixed capital, can be withdrawn only by liquidating the business. Every business concern must invest enough to meet its minimum requirements of these working

capital items. (They consist mainly of cash, marketable securities, inventories, and accounts receivable.) Each of these items may circulate one or many times during the year. In the rhythm of the business cash is spent for raw materials, which in turn become semifinished products, finished products, accounts receivable, and finally, cash. Then the cycle starts over again. But unless the volume of production changes, the aggregate amount of circulating capital remains more or less constant.¹

It is not at all uncommon for a corporation to have a greater investment in working capital than in fixed capital. The nature of the business is the determining factor. For example, a retail store will have most of its capital tied up in merchandise on the shelves, customers' accounts, and cash. Its sole fixed capital may consist of minor items such as fixtures. It commonly rents rather than owns the building in which it operates. Even if the building is owned, the retail corporation has to raise about three or four dollars of circulating capital for each dollar of fixed capital. At the other extreme is a public utility whose business is carried on largely by the use of a fixed plant to manufacture and distribute its product. It sells for cash or on short-term credit. It needs little inventory of raw materials; its finished product is a service which cannot be stored in great amounts, if at all; and cash is constantly coming in to meet its payrolls, fuel and material bills, and taxes. If it is an electric utility generating its power by water, its working capital needs are even smaller, and virtually all of its capital is tied up in plant. Public utilities require only about one dollar of circulating capital for every five to ten dollars of fixed capital.

Between the retail trade and the public utilities will be found the great bulk of business corporations. Manufacturing concerns, usually thought of as owning factories and machinery, ordinarily have a greater investment in cash, inventories, and accounts receivable. They are more liquid than is usually believed, particularly since reinvested earnings have, as the result

¹ To avoid confusion, it is well to recognize that the term working capital is also used to indicate *net* working capital, or the difference between current assets and current liabilities. The reader should be sure of the context when the term is used. It would be preferable to use "net working capital" when the term means current assets minus current liabilities.

of war restrictions on the acquisition of plant and equipment, accumulated in the form of current assets. According to Securities and Exchange Commission reports, current assets of United States corporations increased from \$55 billion in 1939 to \$115 billion in March, 1948, and net working capital increased from \$25 billion to \$62 billion between the same dates. Thus, General Motors Corporation in 1946 had \$1 billion invested in current assets and only \$600 million in plant and equipment. Bridgeport Brass Company had two dollars of current assets for every dollar of plant. Standard Oil Company of New Jersey had about the same amount invested in current assets as in plant. An extreme case is found in Curtiss-Wright Corporation which held about seven dollars of current assets for every dollar of fixed assets at the end of 1946. From these examples it is clear that any financial plan must give consideration at least to minimum needs for working capital as well as to fixed capital requirements.

One further point of great importance should be made. It concerns the adequacy of the financing. Perhaps no graver error can be committed in promotion than the failure to anticipate capital needs correctly and provide for them adequately. Many half-constructed projects turn out to be worthless because they cannot start operating until they are completed; yet additional financing is difficult once the outlook becomes dubious. (The way to obviate such failures is to be sure that the financial plan not only covers reasonable requirements for fixed and working capital but allows a good measure for the inevitable unforeseen contingencies that spring up to add to the cost of getting the business started. Frequently, initial operating losses are inevitable, and care should be taken that there is adequate capital to see the corporation through this period. Thus the first requirement of a good financial plan is that there be adequate capital.

The actual capital required is a matter of intelligent estimate. In the wholesale and retail trade and personal service industries, only a small amount of capital is required per dollar of business done, for the rate of capital turnover (sales :- capital investment) is high. It is not uncommon for such concerns to do three or four dollars worth of business on each dollar of invested capital. Manufacturing corporations usually sell about one to three

dollars of product for every dollar of invested capital. On the other hand, public utilities and railroads do only twenty to thirty cents' worth of business for every dollar of invested capital, that is, they require three to five dollars of investment for every dollar of sales. This low rate of capital turnover means that financial planning for railroad and public utility concerns involves much larger sums for a given amount of anticipated sales. It also indicates why the margin of profit on each dollar of sales must be high to yield the same rate of return on each dollar invested.

After making sure that their estimates are adequate, the banker and the promoter or executive will address themselves to the problem of raising the funds most advantageously.

Expected Earnings as a Factor in Determining Capital Structure.—The size and regularity of future earnings are perhaps the most important elements shaping the capital structure. If earnings are sure to be large and reasonably stable, a corporation may properly incur indebtedness in the form of bonds should market conditions and other factors so dictate. If, on the contrary, earnings are likely to be highly variable and uncertain, it might be financial suicide to assume a burden of bond interest charges which could not be met in years of poor earnings. Even if there is every expectation of large earnings, it must be remembered that frequently "hopes are dupes" and it is easy, particularly for the promoter, to view the future through rose-colored glasses. It is the banker who should provide the antidote to this overoptimism. He must face squarely the fact that many economic and business forecasts are wide of the mark, even when made by capable and honest men.

There is no act more fraught with danger than that of economic forecasting. Yet almost every business decision is based upon a forecast. The reason why errors in prophecy been more costly in business is that the businessman does not risk everything on the likelihood that his forecast is correct. Instead, he hedges—that is, he makes his arrangements in such a way that if his forecasts misfire, he will still have a margin of safety to fall back on. No business is assured of a continued existence, much less a successful existence. The high mortality

rates of new businesses are well known. They represent the price individuals pay for their economic freedom to try to do the job better. They are the evidence that our economic society is in a process of constant adaptation, and that economic progress moves along over the broken hopes of those who sought to gain by serving better. No miraculous legerdemain of the investment banker or promoter can save a concern from failing to live up to its profit expectations, or even from failing to earn the going rate of return on its capital investment; but a wise banker or promoter can arrange the financial structure so as to protect the corporation against the financial failure and bankruptcy that follow adversity in quick succession if the capital structure is so rigid that it cannot "roll with the blow."

It is perhaps axiomatic that the strongest capital structure is the most flexible and simplest one, consisting of common stock only. Come hard times and lean earnings, there are no bondholders, backed by the sheriff, to demand their interest and to deplete working capital that is needed to keep the concern afloat until conditions improve.

Even preferred stock, on which dividends can be suspended by directors during times of adversity, lends an element of rigidity to the capital structure. If it is cumulative, it may soon make remote the possibility of dividends on common stock, thus forcing the corporation to do any new financing by borrowing. In so far as management considers itself to be under a moral obligation to continue preferred dividends despite poor earnings, because it sold the stock to conservative investors who expected to receive steady dividends, preferred stock dividend requirements may deplete working capital as much as bond interest. And when the company has made an unqualified promise (not based on earnings) to repurchase stock for the sinking fund, it is under another moral obligation to deplete its capital, even though, legally, the corporation could not be forced into receivership by failing to pay into such a sinking fund.

Perhaps these dangers of preferred stock can be exaggerated, since the record shows clearly that in times of adversity preferred stock dividends usually have been omitted shortly after common stock dividends. However, if the usual cumulative provision

is present, both common and preferred shares during the time of arrearages become feeble instruments with which to raise new capital.

Can it then be said that the general rule is that corporations should issue only common stock, and that preferred stocks and bonds should always be considered as the exceptional alternatives? Perhaps that would be the safest rule, but safety is not the only desirable quality of a capital structure. In practice, it is usually balanced by a desire for added profitability, the need to mobilize funds from many sources, and the desire of management or the promoter's group to retain control.

Forecasting Earnings in Different Industries.—Before inquiring into the ways in which these competing objectives are brought into balance, it is necessary to appraise the extent to which safety may lie in the predictability of earnings in different kinds of industries. Since this is a key question, not only in financial policy but in the art of sound investment and in the intelligent and socially desirable use of society's capital resources, it deserves more than passing attention.

Corporate business, like all human affairs in life, is fraught with risks. These risks arise because we cannot have complete knowledge about the forces that might cause loss. If we were sure that a business would turn out to be profitable, there would be no risk; if we were sure it would turn out to be a total or partial loss, there would also be no risk. Where gain or loss is certain, there is no risk, because risk arises from uncertainty and unpredictability. Some of these uncertainties can be eliminated by improved knowledge of economic and business processes; some can be eliminated by governmental policies that make the rules of the game stable and predictable; some might be eliminated or at least decreased by effective policies to prevent the exaggerated swings in the national income that are characteristic of the business cycle. Some risks can be insured against by reducing many individual uncertainties to a certain loss for the group as a whole, as is done by insurance; some risks may be shifted to others, as in hedging. But even after allowance has been made for all these devices for minimizing or shifting risks, Ithe major uncertainties of business success or failure remain. There is no way to take out an insurance policy against business failure, and the golden rule of individual enterprise capitalism seems to be that he who would profit by satisfying the wants of his fellow men must run the risk of failure.

But there are degrees of uncertainty and it is necessary to distinguish between those types of business that have a high degree of uncertainty and whose earnings are well-nigh unpredictable, and those in which the risk is smaller and the chances of actual prediction are better, even though far from perfect.

Generally speaking, earnings are most difficult to forecast for new concerns in new industries. When both the individual concern and the industry are new there are no guideposts, and most earnings projections are the result of dead reckoning, based upon assumptions as to prices, costs, and volume of sales that may or may not be approximated in reality. It is for this reason that each new industry must go through a period of capital starvation. The early companies supplying electricity to cities and towns were ordinarily unable to tap any of the large reservoirs of capital. No one knew what their earnings would be, or even whether they would succeed. In fact, they had to depend for part of their capital on credit advanced by equipment manufacturers, such as the General Electric Company and the Westinghouse Electric and Manufacturing Company, which sometimes took the unmarketable securities of the local companies in payment for equipment. After a quarter of a century, electric light and power companies began to gain recognition for their stability of earnings, and this permitted them to obtain capital by selling a variety of securities. At present, even a newly established electric public utility presents a project whose earnings can be reasonably well estimated, for accurate engineering estimates of the future costs can be made and the volume of business to be done can be reasonably well foretold by knowledge of the nature of the population, the economic foundation of the community, the level of income, and such other measures of well-being as are available. Armed with these estimates, the promoter may expect the banker to approve a capital structure that may include bonds and preferred stock as well as common stock.

The financial history of the automobile industry presents quite a different picture. In the early stages, it too could not obtain capital from the general market. The "horseless carriage" was thought to be essentially a "rich man's toy" and therefore a major gamble; and so our automobile industry started with the small personal and family savings of the Duryeas, the Fords, the Dodges, and the small circle of acquaintances who could be induced to put some of their money in this new and promising industry. The sequel is well known. Many lost every dollar they invested; others became fabulously rich.

Even up to the present, the leading companies in the automobile industry have raised little or no capital by selling bonds to the public, and only a little preferred stock exists in the entire industry. It has taken nearly half a century for the demonstrated profitability of a few companies (and losses for many) to convince bankers and investors that the possibilities of success are great enough to warrant the public sale of common stock. At the close of World War II, common stocks of new companies like Kaiser-Frazer, Playboy Motor Car, and Tucker were offered to the public rather unsuccessfully, even when a seller's market in automobiles was very likely to make the industry prosperous for several years because of accumulated demand and the inability of established companies to turn out enough cars to satisfy more than a portion of it. For example, the second issue of Kaiser-Frazer common stock was withdrawn when two of the three underwriters (Otis and Company and First California Company) terminated their agreement in February, 1948. The original sale of Playboy was called off in October, 1948, after five months of selling effort. The Tucker Corporation went into receivership before it got into volume production.

Here then are two leading American industries of about the same age, with rates of growth that bordered on the prodigious, but with radically different financial structures. Why? A study of the ways in which these and other industries are affected by the factors determining financial policy will illustrate the way in which they operate in all concerns and industries.

Since the size and stability of earnings is a most important factor, we might look at the reasons why electric light and power

companies have more predictable earnings than automobile and other industrial companies. The reasons suggest themselves at once. The first factor is stability of demand. The demand for electricity is more stable than for automobiles because electricity. especially for lighting, is a necessity or a "required convenience," while one can get along without an automobile; and because electricity sells at a small unit cost, and the use of more or less of it affects the typical family or business budget little. It has the "importance of being unimportant" budgetwise. On the other hand, the purchase of an auto is a major financial undertaking. Moreover, electricity is perishable; one has to buy today what is used today. An automobile is durable and capable of delivering more rides even if bought ten years ago. The purchase of a new one can be postponed. It should be said that even automobiles have a more stable demand than do expensive producers' goods, such as locomotives and heavy industrial machinery, which suffer complete collapse in times of business recession. (Our manufacturers sold a total of one new locomotive in 1932.) On the other hand, the demand for consumers goods of small unit price, particularly where purchases are habitual or the goods are necessities is subject to little variation. Salt, bread, cigarettes, chewing gum, soap, and snuff are examples.

Stability of sales price is another factor determining the regularity of earnings. Electric rates change infrequently.) This is due to the monopolistic position of each local company and to the fact that regulatory commissions order rate changes at infrequent intervals. Although competition among automobile manufacturers is not "perfect," competitive forces exert a much stronger influence on their earnings than on those of most public utilities. Some companies have to contend with a much wider swing in prices of their products than either of the two considered here. Copper-mining companies, woolen-goods manufacturers, tire and rubber companies are examples of concerns whose earnings are materially affected by competitive conditions and price changes.

A third factor is control over costs in relation to selling prices.) Here the contrast is not clear. Neither the electric company nor the automobile company has complete control over its costs. However, the auto company is free to adjust its selling price to its costs, if competitive conditions permit, while the price of electric service adjusts itself only slowly to increases and decreases in cost.

Sometimes, a nonregulated industry is pinched by rising prices because it has a price that is frozen by custom. Prices of gum, candy bars, cigarettes, and matches may rise more slowly than costs. Bread-baking companies may endure higher flour and labor costs before raising bread prices, and so fare worse in periods of inflation than of deflation. The most extreme help-lessness in times of sharply rising prices and costs is exhibited by the gold-mining industry. Since the price of gold is fixed by Congress, it is extremely rigid over long periods of time, while materials and labor must be purchased by mining companies in price-inflated markets. Contrariwise, they benefit by deflation since their product does not fall in price or demand. It is clear that a forecast of earnings for such companies depends largely upon whether price inflation or deflation is expected.

Other reasons for stable or unstable earnings are to be found in price changes which affect the values of inventories. Tire and rubber manufacturers nearly went broke because of inventory losses in the 1920-22 deflation. Meat-packing companies may show profit or losses for the year depending upon whether the prices of livestock have risen or fallen. Similar risks are faced by some textile companies, such as woolen manufacturers, who ordinarily cannot hedge their positions in the future's market, or cotton manufacturers who might prefer speculation to hedging. This element is of little or no importance in public utilities, since inventories are an insignificant part of their total investment.

Sometimes, earnings are obliterated by losses on accounts or notes receivable because of the inability of debtors to pay. International Harvester Company wrote off tens of millions of dollars of losses on receivables during the great depression of the early 1930's. Here again, the utility and automobile industries are much alike. Both do business on a cash or very short-term basis, and credit losses are not a major factor.

Occasionally earning prospects are clouded by uncertainty and

litigation over patent rights. Where a business depends upon the exclusive right or monopoly granted by a patent or copyright, its position may be strong or weak. Exclusive rights must be based on claims that are clear and do not involve infringement on the rights of others. The famous Selden patents in the auto industry exacted "tribute" from all auto manufacturers until challenged successfully by the Ford Motor Company. Had the challenge been unsuccessful, the entire future of the Ford concern might have been jeopardized.

The reader, from his imagination and experience, can add to the list of factors which will affect earnings in different industries: tariff repeal will drastically cut earnings of industries needing tariff protection; laws increasing labor costs will do most harm to industries having a large labor component in total costs: prohibition destroyed the earning power of most of the liquor industry; wars have very uneven impacts on different industries; new technical developments make whole industries obsolete. The automobile displaced the buggy and bicycle. The private automobile and bus displaced all interurban and most street railway systems. Electricity displaced gas for lighting and now challenges it for cooking and water heating. Synthetic fibers, like rayon and nylon compete with natural fibers, like cotton, silk, and wool. Trade-union policy may be a factor in relocating industry, hampering concerns in one area and benefiting those in a nonunion area.

With all these variables to consider, is it any wonder that a forecast of earnings must always be tentative, and much more tentative in some cases than in others? That is why it is safe to err on the side of flexibility, by the use of common stock, rather than to give hostage to the dangers that inhere in the fixed charges of bonds.

Other Factors Determining Form of Capital Structure.—Although earnings are of prime importance, there are other factors which also determine the type of securities a corporation should issue. These factors are: (1) the needs and preferences of different investors; (2) the habits and traditions of the investment markets; (3) the condition of the securities markets; (4)

control of the corporation; (5) profits from "trading on the equity"; (6) the effect upon working capital position; and (7) the necessities of the moment. While there is an obvious overlapping of these factors, each is important enough to deserve some elaboration.

Needs and Preferences of Investors.—If the amount of capital needed by a concern is large, the most economical way to raise it is by planning the assortment of issues in such a way as to meet the preferences or prejudices of all classes of investors. For example, only by issuing bonds can a corporation tap the reservoirs of capital of such institutions as banks, life insurance companies, and trust funds which are usually prohibited by law from purchasing stocks, particularly common stocks. Other large lenders, like fire insurance and casualty companies, as a matter of investment policy keep a large proportion of their funds in bonds. Many individuals consider stocks speculative and prefer to purchase bonds on the grounds that they are sounder investments. The seller of securities, like the seller of automobiles or ladies' hats, must accept market preferences. Some investors who will not buy common stocks will buy preferred stocks for much the same reasons that they buy bonds, except that the vields on preferred stocks tend to be higher.

Investment Habits and Traditions.—Closely allied with legal restrictions and institutional preferences are the habits and traditions of the investment market. These are sometimes based on experience or careful reasoning, but frequently they are accepted because they always have been accepted. That is why it has been long considered proper for railroads to issue bonds while it has been thought much more questionable for industrial corporations to do so. Except for the sanctions of historical practice and the flimsy argument that railroads have more real tangible property relative to total investment than industrial corporations, there seems to be little in either logic or history to demonstrate a superior capacity of railroads to carry bonded debt. Many of our major railway systems have gone through financial reorganization several times, and one-third of our total railway mileage was in receivership in the depressed 1930's (another third was

on the brink of failure) as the result of the illusion that railroad corporations can carry large bonded indebtedness. Perhaps the most extreme demolition of a financial myth was experienced in the field of real estate finance: funded debt in the form of mortgage bonds was relied upon heavily to construct apartment houses and commercial buildings, and over 80 per cent of the issues were defaulted during the Great Depression. This demonstrated more clearly than thousands of words that mere "brick and mortar" do not justify bonded debt, or make the loss easier for the many "conservative" investors to bear. In many instances these bonds were sold by investment banks which advertised "no losses to investors in twenty-five years." To a certain extent the investment banker must take the investment community as he finds it, but his selfish interest should keep him from following false financial policies, for in the long run they lead to loss.

Condition of the Securities Market.—Investment prejudices and preferences may be of long duration, but their intensity is likely to vary from time to time. These preferences will be registered in market quotations. All types of securities respond to the ups and downs in industry, commonly known as the business cycle, but bonds, preferred stocks, and common stocks may differ in the timing and amplitude of fluctuations. As was previously noted, in the downswing from 1929 to 1932, common stocks in general shrank in value to about 88 per cent, preferred stocks about 70 per cent, and bonds about 45 per cent. This, of course, was one of the most extreme declines in history, yet its bearing upon financing is clear. Ordinarily, during periods of prosperity, common stocks appear to be attractive and their prices rise. This was particularly true of the long bull market in the 1920's and in 1936, 1937, 1945, and 1946. With dividends rising and stock-market profits almost certain, everyone wants to "get into stocks." At such a time, common stock financing is usually the most economical, even for firms that can issue bonds with propriety.

It is not uncommon in prosperous times for corporations to sell common stocks on a 3 to 5 per cent earnings-yield basis;

Ch. 7]

that is, stocks sell from twenty to thirty times average earnings. In periods of depression they may sell on an earnings-yield basis of 20 per cent to 50 per cent or at two to five times average earnings. The difference in the cost of obtaining common stock capital is therefore striking. On the other hand, bond prices are much more stable. In periods of depression their price may fall somewhat and in prosperity rise somewhat, depending on whether they are high grade or low grade, but as a rule bonds are the only economical way of financing during a depression, and even then they may have to carry a high yield to bring them into line with the market. That is why short-term callable bonds or notes may be sold with the expectation that they will be refinanced at lower rates when the worst of the depression or crisis is over. Sometimes, bond prices may fall as the peak of the prosperity phase of the cycle is reached. This is because increased business activity increases the demand for loanable funds and tends to raise interest rates, and this depresses the prices of outstanding bonds until their yield is brought into line with prevailing market rates of interest. Thus it may be that bond prices fall at the same time that common stock prices rise, making stock financing doubly advantageous. At such times, new bonds or high grade preferred stocks usually carry the convertible privilege or stock purchase warrants to give them a "common stock flavor" and improve their attractiveness. Periods of prosperity and high stock prices are used to retire debt by the proceeds of stock sales as well as to raise new capital.

Such is the "normal" case. Sometimes, however, periods of business prosperity are not accompanied by such high prices of common stocks or such low bond prices that there is a premium on equity financing. Quite the reverse may be true. For example, of all the new corporate securities issued in the first seven months of 1947, 74 per cent were bonds, 15 per cent were preferred stocks, and only 11 per cent were common stocks—all in a year when peacetime employment, production, national income, and corporate profits were near their all-time high. The only explanation of the seeming paradox is that stock prices reflect attitudes regarding the future rather than present conditions, and

those attitudes seemed to be that conditions were too good to last.

Corporate Control.—Since common stock now nearly always carries voting power (nonvoting common stock is frowned upon by the New York Stock Exchange and the Securities and Exchange Commission, and at present is not considered "respectable" in financial circles), management runs the risk of losing control of the corporation if new common stock is sold to the public to raise capital. This possibility is sometimes the most important consideration of all. Management that depends for its control upon the possession of a majority of the voting stock will endanger its position by selling new voting stock unless it has the funds to take up its pro rata share of the new stock. Here it is preferable to raise the capital by selling nonvoting preferred stocks or bonds if the market will absorb them on reasonable terms. If not, there is the choice of getting along without the additional capital or of issuing voting stock under conditions that will not endanger its control. The latter would be possible by organizing a voting trust, placing the new common stock therein, and selling voting trust certificates (virtually voteless stock) to the public. Since the management would designate the voting trustees, it would continue to control the corporation. But voting trusts are legal for only a limited period of time (five years in most states) and at the end of that time renewal might not be feasible or possible; hence it may be only a short-term solution.

Another possible way to issue voting stock without endangering control is to depend upon wide dispersion of the new stock to prevent the mobilization of any block large enough to challenge the management. It is well known that an absolute majority of the voting stock is not needed to maintain working control over a corporation. If there are no opposing owners of large blocks, and if ownership is well dispersed, a concentrated minority ownership of from 15 to 50 per cent may be adequate, the management being in a key position to secure the proxies of the scattered stockholders. Of course, in such cases, management always runs the risk of being ousted by a rival faction if

someone wants to undertake the trouble and expense of trying to mobilize the stockholders against the management—usually a rather formidable task with an uncertain outcome. Dependence upon dispersion of ownership is much more likely in the large than in the small corporation, since in the latter case an appeal is made to a limited group of persons, located in a small geographic area and usually known to each other, thus making the mobilization of the opposition much easier. Hence, small corporation managements may be less willing to sell voting stock to outside investors.

Trading on the Equity.—The advantages of "trading on the equity" are illustrated in many walks of life. The idea is simple. It pays the common stockholder to employ additional capital if it will earn a return larger than the cost he has to pay for the use of the capital. Thus, if a corporation can employ its capital so as to earn 10 per cent, the common stockholders will get more profits if that capital is raised by selling bonds or preferred stock, with an interest or dividend rate of less than 10 per cent, than by selling more common stock with an unlimited pro rata claim to earnings. For example, let us assume an earnings rate of 10 per cent. If the corporation needs \$10 million and raises it by selling 1,000,000 common shares at \$10 a share, the earnings will amount to \$1 million (10 per cent of \$10 million), or \$1 per share. If, instead of issuing all common stock, the corporation issues \$5 million of 5 per cent preferred stock at par and 500,000 shares of common at \$10 a share, the common stock would get the extra 5 per cent earned on the capital provided by the preferred stock. The company would still earn 10 per cent on \$10 million, or \$1 million. Of this, \$250,000 (5 per cent of \$5 million) would have to be paid in preferred dividends, leaving \$750,000 for the 500,000 shares of common stock, or \$1.50 for each share. Thus, the common stockholders would increase their income per share by 50 per cent by raising half of their capital through preferred stock rather than through common. The more that is raised by issuing preferred stocks or bonds the greater will be the rate of return on the smaller amount of common stock. The "thinner" the equity of the common stock, the

more profitable it can be for the common stockholders. This applies only as long as the corporation can in fact earn at a rate that is higher than it pays to the bonds or preferred stock. It is obvious that if because of business depression, new competition, rising operating costs, or other causes, the company earns only 2 per cent on its capital, total earnings would be \$200,000, or \$50,000 short of its preferred requirements, thus leaving a deficit for the common stockholders. If all common stock were issued, a 2 per cent rate would yield a return of 20 cents for each share. From these illustrations it should be clear that trading on the equity is profitable as long as the concern prospers, but it may be disastrous if many poor years are experienced.

There is little evidence that industrial corporations that have resorted to large-scale borrowing have been any more profitable to their stockholders than have other companies. In fact, the available evidence indicates that over a period of years they have been less profitable than nonborrowing corporations, although the earnings experience was probably determined by forces other than borrowing.

Working Capital Position.—The working capital position may also affect the choice of securities to be issued. This factor cuts two ways. On the one hand, a corporation that expects to face the need for larger amounts of current capital as its business expands may find it prudent not to incur indebtedness in the form of bonds, but rather to build up a substantial amount of equity capital upon which it can base an appeal for bank loans or merchandise credit. That is, it must conserve its borrowing power for future use. This is a wise precaution even if expansion is not inevitable, because many unforeseen occasions requiring bank loans are likely to arise in the normal course of events. It is one reason why industrial corporations are less likely to issue bonds than public utilities or railroads.

On the other hand, if growth is not anticipated and the corporation has a generous working capital position, it may be able to carry some bonded debt even if its earnings are unstable. That explains why industrial concerns with highly variable earnings, such as the steel companies, the meat packers, and tire

Ch. 7]

manufacturers, have been able to carry substantial bonded debt without default despite drastic declines in business and earnings, and, in some cases, years of operating deficits during the Great Depression. Their survival is easily explained by the fact that these companies have generally had large amounts of working capital—far more than the amount required to pay interest in depression years—and also by the fact that part of the loss in bad years was made up of cost items, like depreciation, which do not call for immediate expenditures of cash. It is important to note that a corporation can have a series of losses in the accounting sense without losing cash, although frequently accounting losses may also mean the depletion of cash.

Necessities of the Moment.—Finally, the choice of the type of security to issue is sometimes not a choice at all, but the surrender to a necessity that is without an alternative. Early British canal companies were said to have "invented" preferred stock to finance their half-completed projects when no more bonds could be issued and where the outcome was so uncertain that common stock was nearly unsalable. To argue the relative merits of bonds, preferred stocks, and common stocks under such conditions is idle. Similarily, corporations sometimes find themselves in a position where they must issue bonds or nothing. If they are hard pressed for capital, if no new short-term loans are possible or prudent, if preferred stock is in arrears and the common stock is selling at a low price, the only possible salvation may lie in a new issue of bonds. To be sure, previous unwise financial policies may account for this "Hobson's choice," but that does not alter the fact that corporations have often found themselves restricted to only one means of financing. Sometimes, this means is utterly devoid of attractiveness to the corporation, but it may be necessary for financial survival. Corporate managements who guided their concerns through the rough waters of commodity price deflation, high interest rates. and tightening bank credit in the period 1920-22 did not resort to the issuance of short-term bonds bearing very high rates of interest because it was attractive, profitable, or even prudent financial policy in the usual sense. But in many cases such issues kept the craft afloat until more attractive alternatives were feasible.

It should be clear by now that the many factors dictating the capital structure are of different importance in different situations. A newly organized corporation planning its first appeal for funds has one set of problems; a well-established corporation with widely distributed securities outstanding, a demonstrated earning capacity, a sound working capital position, and a reputation of having good (or bad) management has another set of problems. But financial plans in both cases must give recognition to the basic forces discussed above. The established corporation has one important additional source of capital—the reinvestment of earnings. This is one of the soundest and most frequently used devices for expansion and it is employed in some degree by all corporations. Seldom are all earnings paid out in dividends. It is most unusual to find a corporation that has not supplied at least a part of its capital requirements from this source. In fact, the reinvestment of earnings has become such a firmly imbedded corporate financial practice that there is a question whether in some instances it is not carried to the extreme of depriving the stockholder of the dividends he ought to receive.

Financing Small Business.—The small corporation will generally raise capital from a circle of family friends or associates whose interest can be aroused sufficiently to make them invest in the undertaking. Sometimes the problem of raising the needed funds becomes acute, especially where there exist potentialities of large profits or losses. This is the usual situation in which new enterprises find themselves. The commercial bank, the savings bank, the trust company, the insurance company, and other financial institutions that accumulate and invest the savings of millions of individuals are usually forbidden by law to make such investments; but even if there were no legal restrictions prudence would prohibit the lending of other people's money in these ways. Safety must be the one objective of these institutions, and this quality is what most new promotions conspicuously lack, no matter how thoroughly those associated with the

Ch. 7]

enterprise are convinced that they have certain success. Neither is the well-established investment bank with a wide clientele, who depend largely upon its judgment in investment matters, likely to risk its reputation on the uncertain outcome of the average run of new and untried enterprises, even if it were to receive a very large commission on the sale. Thus the promoters are ordinarily dependent upon the services of persons who may set themselves up as investment banks or dealers but who are in reality unknown entities with little capital and no reputation to lose. Their two outstanding attributes are a flair for high-pressure salesmanship. and an overwhelming desire for the huge, if not clearly exorbitant, commissions, which in the past have been as high as onethird or one-half of the sales price of the stocks sold. They are more interested in dollars today than in their reputations tomorrow, for tomorrow they may be out of business or far away. This sort of security selling has been discouraged by federal regulation since 1933. It is usually the last resort, to be used only when those closely associated with the project cannot engender the enthusiasm that will result in stock purchases by relatives, associates, or a few wealthy businessmen who sometimes put capital into new projects when they are convinced that the chances of gain make the risk worth taking.

The absence of adequate facilities for providing risk capital to new enterprises is a long-standing gap in our financial machinery. Many plans have been suggested for filling this gap, sometimes with the aid of the federal government, but so far nothing of great consequence has materialized. The gap may be of significant social consequence because, despite all talk about "bigness" and "concentration," the great majority of our 3,800,000 business concerns are small in size. It is estimated that of the 670,000 new businesses that came into being between 1943 and 1946, 85 per cent had fewer than eight workers, and less than 1 per cent employed fifty or more workers. The large majority of the new firms were in the retail, service, or construction lines, where initial capital requirements are small and can usually be satisfied from local sources and normal trade channels.

During World War II the need to meet the expanded capital requirements of small concerns was clear, and Congress re-

sponded by creating a separate agency, the Smaller War Plants Corporation, to deal with the problem. Likewise, the Reconstruction Finance Corporation, through its many subsidiaries, advanced millions of dollars to business concerns, small and large, to aid the war effort.

But other than these, there exist at the moment only a few institutions to meet the problem. The Filene interests in Boston have sponsored the New England Industrial Development Corporation to finance small new concerns. Similar community lending agencies have been established in Baltimore, Maryland; Wilkes-Barre, Pennsylvania; and Louisville, Kentucky. A few investment trusts, like the Atlas Corporation and the Chicago Corporation, have used part of their funds to help finance small and medium-sized individual concerns. The Investment Company Act of 1940 provided that investment trusts might subscribe, up to 5 per cent of their assets, to stock in a special corporation to be organized by them for the purpose of providing venture capital to industry. Little or no use was made of the opportunity until 1946 when a group composed of leaders in New England industry, science, education, and banking organized the American Research and Development Corporation, whose function was to investigate and finance promising new business projects with funds supplied by institutional investors, including insurance companies and investment trusts. This corporation was approved in August, 1946, by the Securities and Exchange Commission, which gave it permission to carry out its plans. By 1949 it had issued \$3,500,000 of common stock and had invested in eleven projects, six of which were profitable, one unprofitable, and four in the process of development. A May, 1948 press release announced the formation in New York of an eighteenmember syndicate known as the Enterprise Development Corporation (Endeco), whose members come from wealthy families. (Rockefeller, Ryan, Teagle, etc.), to purchase and develop going enterprises in the metal and mechanical industries. The original commitment of \$5 million could be indefinitely expanded should opportunities arise.

Many proposals have been made for financial aids to small

business.2 Weissman discusses the following aids: setting up special capital credit banks as subsidiaries of the Federal Reserve Banks, special government bureaus to find sources of funds for small business, the development of regional capital markets for local concerns, the continuation of the Smaller War Plants Corporation into the postwar period, government guaranty of private bank loans, and his own plan for twelve regional capital banks to be financed by member banks of the Federal Reserve System. Many of these proposals have been before Congress in the form of bills, but none has been enacted into law. The protagonists of aids to small business have been so vocal and persistent that the campaign has taken on almost the proportions of a social movement. One wonders if the financial horizon in the business world will soon be dotted with many new and perhaps strange forms. This would not be altogether unexpected. Amendments to the banking laws in 1932 and 1935 provided more ample credit facilities to business. These amendments permitted commercial banks to make longer-term loans, and also permitted the Federal Reserve Banks to make direct industrial loans when deserving borrowers could not obtain credit elsewhere. The banking powers of the Reconstruction Finance Corporation were similarly expanded by legislation in 1934 and 1938

One line of small business which had been amply, if not profusely, supplied with credit facilities by government has been farming. Institutions such as the Federal Land Banks, Federal Intermediate Credit Banks, Federal Farm Mortgage Corporation, Bank of Cooperatives, Production Credit Corporations, Commodity Credit Corporation, and the Rural Electrification Administration all grant agricultural credit in one form or another. Whether a similar crop of new lending agencies for small business will appear is doubtful, but some expansion is entirely possible, particularly if we have a severe business recession. Under such conditions rescue operations on a large scale might well be attempted.

Meanwhile, it must be recognized that short-term credit needs

² For a useful study, see Rudolph L. Weissman, Small Business and Venture Capital (New York: Harper & Bros., 1945).

of small business are pretty well taken care of by commercial banks and merchandise creditors. Even long-term needs financed by debt can be reasonably well met by term loans from banks and insurance companies. It is on the "equity capital" foot that the shoe pinches, and given present high taxes on individual incomes and corporation earnings, the usual springs of equity capital (reinvested earnings and stock purchases by wealthy individuals) flow less vigorously. It is not impossible that the need for legitimate risk capital will in the future be supplied either by new government lending agencies, as proposed by those who would project the federal government further into the credit system, or through a system of privately owned capital banks, as proposed by others, including the influential Committee for Economic Development.

REFERENCES FOR FURTHER READING

Buchanan, N. S. The Economics of Corporation Enterprise. (New York: Henry Holt & Co., 1940), Ch. 6.

Burtchett, F. F. Corporation Finance. (New York: Harper & Bros., 1934), Chs. 18-20.

Dewing, A. S. *The Financial Policy of Corporations*, 4th ed. (New York: The Ronald Press Co., 1941), Book II, Chs. 4, 5.

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Ch. 10.

Hoagland, H. E. Corporation Finance, 3rd ed. (New York: McGraw-Hill Book Co., Inc., 1947), Chs. 17-19.

Husband, W. H., and Dockeray, J. C. Modern Corporation Finance. (Chicago: Richard D. Irwin, Inc., 1948), Chs. 11-13.

Jome, H. L. Corporation Finance. (New York: Henry Holt & Co., 1948), Ch. 9.

Chapter 8

PROMOTIONAL FINANCE AND OVERCAPITALIZATION

It is by now apparent that in American corporate finance there is a wide gap between the theory and the practice of issuing par value stock, at the time of promotion. Ordinary prudence and the law require that a bank or an insurance company afford the public some protection before assuming the role of trustee of its money; hence the requirement that stock issued by these institutions shall be sold for cash at par or above par. Generally there is an equivalence between total capitalization (including paid-in surplus) and the value of the assets. No stock is "given away" for promoters' or bankers' services, or issued for overvalued property. The profits of promotion can come only out of the subsequent successful operation of the business. This is also true where there is effective regulation of new securities by government agencies, as in the case of some utilities and all railroads. Here, rewards for the legitimate services and expenses of the promoter may be permitted, but the amount of common stock to be issued will be carefully scrutinized to prevent "overissue."

In the unregulated majority of American industry, however, it is customary to reward the promoter and his associates by issuing common stock in generous amounts. This is true not only of the promotion of entirely new concerns, but of consolidations of existing concerns as well. In his study of fourteen large consolidations some years ago, Dewing found that tangible assets accounted for only 40 per cent of the securities issued. The remainder was divided as follows: 10 per cent to promoters for services, 10 per cent to bankers for services, 20 per cent to manufacturers for excess value of plants, 15 per cent to investors to

help the sale of other securities, and 5 per cent for lawyers' fees and other work of incorporation.¹

Promoters' Profits and Overcapitalization.—Only two legal restraints upon this process were imposed, both of which could be easily met in form or circumvented. The first had to do with the obligations of the promoter to the business entity he erected and to the persons who would become the permanent stockholders. The legal status of the promoter has never been exactly clear. He can hardly be an agent for a corporation not yet in existence, nor is he a strict trustee for a legal entity or a group of individuals whose identity is not defined. Yet he is not in the position of an outsider who can deal with the corporation with complete disregard of its welfare. There is a definite tendency of courts to hold that the promoter has a fiduciary obligation toward the corporation and its future stockholders, and this obligation requires that he may not make secret profits or ratify his remuneration when he has single control of the corporation. In the leading case of Hayward v. Leeson (1900), the Supreme Judicial Court of Massachusetts adopted this point of view: "It is a fraud for promoters to decide for future stockholders in the corporation to be organized that one-third of the whole capital stock is a fair remuneration for their services as promoters, to issue one-third of the capital stock to themselves as such remuneration, and then to invite the public to subscribe to the stock of the corporation, without disclosing that fact to subscribers, and without getting their consent to the payment of that remuneration." 2

Not only the courts, but government agencies regulating the sale of new securities have accelerated the tendency toward full disclosure of promoters' profits. The Securities Act of 1933 requires that the prospectus contain certain information relative to the profits of promoters and insiders, and the Securities and Exchange Commission has repeatedly taken the position that excessive and concealed remuneration to promoters in the form of securities or otherwise is grounds for the issuance of stop

¹ A. S. Dewing, Corporate Promotions and Reorganizations (Cambridge: Harvard University Press, 1914), p. 541.

² 176 Mass. 310, 57 N.E. 656.

orders. Yet it must not be thought that the commission always acts as a judge of the reasonableness of promoters' fees. For example, in two recent cases the commission permitted stock to be sold to the public at one price while some of the same stock was virtually given to the promoters. Since full disclosure was made in the prospectus, presumably the public buyer of the stock was adequately and correctly informed, and there the responsibility of the commission ended.

The first case involved the sale of stock by the Texas Eastern Transmission Corporation, which was organized to take over the "big inch" and "little inch" pipe lines that had been built at a cost of \$146 million by the United States government to transport crude oil and petroleum products from the Texas-Louisiana region to the Atlantic coast during World War II, because of a shortage of ocean-going tankers. After the war the government sought to sell the pipe lines (subject to the right to recapture in case of war), and a group of men organized a small preliminary company with authorized capital consisting of 250,000 shares of \$1 par stock, all of which was bought at par by them. In addition a number of the insiders loaned the company \$1,350,000 on a 6 per cent promissory note, which was later repaid. The corporation then set out to try to acquire the pipe lines to transport natural gas, for which a large and growing market existed in the northeastern states. It tendered a successful bid of \$143 million to the government and proposed to raise \$120 million by the sale of first mortgage 3½ per cent bonds to twelve large insurance companies and about \$30 million by the sale of 3,500,-000 shares of common stock to the public at \$9.50 per share.

The common stock was distributed by a group of 155 investment banks and dealers headed by Dillon, Read and Company, which had taken an active part in the promotion. The underwriting spread of \$1 a share permitted the company to realize \$8.50 per share net. But the real profits to the promoters came when the holders of the original 150,000 shares, who paid \$1 for each share, were given seven shares of new stock for each share of their old stock, thus reducing the cost of the new stock to them to \$.143 per share. This was the same stock that was being sold to the public for \$9.50 a share. Thus the promoters got about

1 million shares, or 22½ per cent of the entire stock issue, at a cost of \$150,000, while the public paid \$33 million for about 3,500,000 shares, or 77½ per cent of the entire issue. The promoters' profits of nearly a million dollars seemed overgenerous in view of certain facts. In the first place, they risked little capital of their own and the project was virtually completed and sure of success once the government sold it to them. Moreover, one of the principal promoters owned a construction company which expected to collect nearly \$1 million in fees under contracts to build compressor stations and additional facilities for the company. Another of the promoters was an engineer who was being well paid for services to the company. A third was a banker who was paid an agent's fee of \$200,000 for placing the \$120 million of bonds with the twelve insurance companies, not to mention others who were paid for services as lawyers, consultants, and officers of the corporation. It should be said, however, that the company was successful and the price of its stock increased to about \$13 a share in the first year, although no dividend was paid.

A second case of large possible profits to promoters was in a much more risky venture, the Playboy Motor Car Corporation, which was organized to manufacture a small automobile to sell in the \$1,000 class. To raise the needed capital, an issue of 20,000,000 shares of stock (1 cent par value) was offered to the public at \$1 a share. It was expected that another \$8 million would be obtained by selling dealers' franchises. The project was frankly represented as a speculative one and a little-known investment dealer tried to market the stock on a "best effort" basis. The three founders of the corporation, who admittedly had no previous experience in the manufacture of automobiles, were to receive 5,000,000 shares of stock at 1 cent a share, while the investing public was to pay \$1 a share for the same stock. This was all clearly stated in the prospectus. Apparently the stock sale was not successful, and after five months the offering was withdrawn and payments refunded. Again, it is difficult for an outsider to decide whether the promoters' services warranted these profits if the plan had gone through.

Formality of Full Payment for Stock.—The second legal impediment to large stock distributions to promoters has been more nominal than real. It is the requirement that par value stock shall be fully paid for at the time of issuance; if not, the stockholder is liable for the deficiency. However, this requirement can be formally met without too much difficulty; either stock is issued for the promoters' services which are valued by the directors at the equivalent of the par value of the stock issued, or the corporation can buy property from the promoters, at a price which affords them a profit, in exchange for an equal amount of stock. Thus, the promoters receive their profits in fully paid stock which they may sell or hold. Sometimes, part of this stock is donated back to the corporation (as treasury stock) so that it may be sold by the corporation at less than par (without liability) to raise needed cash.

Of course care must be exercised to see that the formalities of offer, acceptance, and valuation by the directors are complied with and that the requirements of the law of the state of incorporation are observed. Ordinarily, courts will not question the valuation of property or services by directors, since these are matters of business judgment. Most states, including New York, follow the common law rule that the valuation by directors, if made in good faith, is final. This is known as the "good faith" rule. A few states follow the "true value" rule in which actual value rather than the opinion of the directors is the test. However, under either rule courts have seldom imposed liability in the absence of deliberate gross overvaluation. They have permitted directors a wide range of discretion, but they have insisted that the consideration paid for the stock have substance. New York, for example, permits stock to be issued only for "money paid, labor done, or property actually received." Thus, items which have a mere shadow of value, like a formula or trade-mark of very doubtful worth, nominal services of promoters and directors, contracts to render future services, and the use of an individual's name, may be inadequate consideration for stock. One does not have to be very ingenious, however, to find methods which will be recognized as valid consideration for the issuance of stock, thus permitting the promoters to receive fully paid stock

for their services and the corporation to sell fully paid par value treasury stock at a discount.

No-Par Stock and Low Par Stock.-No-par stock can, of course, be easily issued to the promoters for property and services, since no problem of valuation arises, and the formalities and possible consequences of overvaluation can be avoided. The directors simply vote to exchange so many shares of stock for the property and services without valuing either. As long as the property is worth as much as the stated value at which the stock is carried on the books of the corporation, no question of full payment arises. In an accounting sense, the use of par value stock at the time of promotion is likely to result in an inflation of the asset side of the balance sheet to equal the aggregate par value of the stock, some of which is "given away." The use of no-par stock requires no such overvaluation of assets, since the stock can be carried at a nominal value on the liability side of the balance sheet, leaving room for a surplus even if assets are conservatively valued. The same result can be achieved by the use of low par value stock (for example, \$1 a share) when its market price is considerably above its par value. Occasionally the promoters may take their pay in options or warrants to buy stock at a certain price within a certain time. Very infrequently a special class of founders' or management shares may be issued to them.

Promotional Finance and Economic Progress.—Whether or not promoters' profits have been excessive is a question that would be answered differently in different cases. A single project has sometimes made a promoter rich, but others may have caused him losses. It must be remembered that his is a most hazardous occupation; that he seldom gets paid in cash; that he sinks money and time into projects that never materialize. While no data are available, it is easy to imagine that, in the aggregate, promoters' losses have probably offset the gains, some of which have been spectacular.

If a free enterprise society is not dynamic and flexible it has lost one of the major reasons for its existence. Someone must ferret out new opportunities, organize them, sell the ideas to others, and set the projects on their way. The energy with which

this has been done in thousands of places is one of the distinctive characteristics of American economic life. It has been stimulated by the few rich prizes made possible by the generous, even lavish, issue of common stock as a typical American practice. The strict application of the theory of par value would no doubt have checked many promotions, both legitimate and illegitimate, but it is perhaps significant that in the period of economic reform since 1933 there has been no strong movement to change the basic corporation laws which permit generous stock issues. Perhaps we realize their usefulness as well as their dangers.

Overcapitalization or Watered Stock.-Years ago, it was customary for critics of business in general, and corporations in particular, to decry the evils of overcapitalization, or the issuance of "watered stock" as they called it. The term is said to have been coined when a drover by the name of Daniel Drew (who later engaged in titanic financial struggles with Cornelius Vanderbilt and others) found that by feeding his cattle generously with salt and letting them quench their thirst just before a New York butcher by the name of Henry Astor (John Jacob's brother) arrived to buy them, they presented a plump appearance and weighed up very well. How long the butcher continued to buy water at three cents a pound is not related, but when the drover moved into Wall Street, the term undoubtedly followed him there and came to be referred to corporate stock issued without the receipt of an equivalent amount of assets by the corporation; the stock represented only water.

The term "overcapitalization" is much more commonly used in our time, and refers to a condition in which a corporation issues stocks and bonds whose aggregate par value is in excess of the "value" of the corporate assets. But what is the value of the assets? Is it value measured by the original cost of assets, or by what it would cost to acquire those assets now? Probably neither, for such definitions confuse cost with value, and fail to recognize that a business concern is something more than a collection of assets, each having its individual cost. If by reason of ingenuity, skillful management, and a favorable market, a business concern can make twice the net earnings of another con-

cern with the same investment in assets, should the first be limited to the capitalization of the second? Surely the *value* of the first may be twice the *value* of the second, even though the assets of each cost the same, because people do not buy assets for their own sake, but for what they will earn.

The basic importance of earning power as the source of value is now universally recognized. Assets that cannot produce earnings have scrap value only, unless they can be transferred to other uses. Therefore a concern might be properly capitalized on an earnings basis, but overcapitalized (or undercapitalized) on an asset-cost basis. Until a proper definition of overcapitalization is agreed upon, it is hopeless to discuss it, for we don't know what it is. Perhaps most students would prefer the test of earning power, except for the difficulty of accurately predicting earnings at the time of promotion, when honest optimism or synthetic fabrications of estimated earnings might bring an "overissue" of securities.

No-par stock avoids the problem because it does not presume that each share has a certain value; it implies precisely what it is, namely, a share of ownership in a corporation which holds a fund of assets and is expected to operate profitably. If the total ownership is divided into 1,000 shares, each share has a claim of one-thousandth of the earnings and assets. If it is divided into 10,000 shares, each share has a claim to one-tenth as much. Presumably, the true value of the shares is reflected in the market prices at which transactions between informed buyers and sellers take place. It is hard to see what difference it makes whether 1,000 or 10,000 shares are issued.

Is Overcapitalization Harmful?—Does merely placing a par value on the stock change this simple principle? It has been vigorously argued that it does and that overcapitalization is therefore harmful. From the standpoint of the corporation, it is said that overcapitalization causes the dividend to be low, that it leads to reckless management, that it stimulates stock speculation, and so on. It is hard to see any great validity in these contentions. Obviously, if more shares are issued, earnings and dividends will be lower per share than if fewer shares were issued,

but what of it? A corporation simply sells more shares to get the same amount of capital.) This is also the result under par value if par is reduced and the number of shares increased. If management is inclined to be reckless, it is likely to be so regardless of the number of shares of stock outstanding. Speculation may be more active in shares selling at a low price than at a high one, but does that harm the corporation? Many companies "split" their stocks to keep the price low enough to attract wide interest. Overcapitalization does make incorporation more costly by increasing the organization tax and might therefore have one real disadvantage.

It is also contended that overcapitalization is harmful to the stockholder. It is hard to see how this can be true if he is fully informed and acts intelligently. Larger issues mean lower earnings and dividends per share, but also lower cost per share to the shareholder. He should and, unless deceived, will pay a price for his stock in keeping with the prospects for each share. Nominal or par value is of little concern to the informed investor or speculator. It is further contended that overcapitalization leads some stockholders to pay higher prices for their stock than other stockholders, a criticism which is also frequently advanced against no-par stock. Of course this does not follow from overcapitalization as such, but from variations in the market price of stock which must be taken into account in the sale of the new stock. If corporate managements seek to sell the same stock at the same time to different stockholders at different prices, the aggrieved stockholder has a remedy at law, since management is required to treat all stockholders alike. However, selling stock at different prices at different times may be neither unjust nor unlawful, but a simple recognition of the fact that stocks, whether par or no-par, fluctuate in price.

But most important of all is the contention that overcapitalization is harmful to the consuming public, on the ground that a corporation with a large capitalization is forced to charge higher prices for its product if it has to pay interest and dividends on an enlarged capital structure. Any student of economics knows this contention is fallacious, since overcapitalization gives an entrepreneur no additional power to fix prices. Men engage in business

to make profits, and they attempt to fix prices so that profits will be maximized. If they have competitors, they must keep prices in line with the prices of their rivals; if they are monopolists, they will fix prices so that the combination of price, volume, and cost will yield the greatest possible net profit. In neither case does capitalization or capital structure have any material effect. If all that the competitor or monopolist needs to enable him to charge higher prices and make more profits is an overcapitalized capital structure, how simple it would be to become rich! Or, stated in terms of economic theory, it can be said that under either competition or monopoly the entrepreneur will adopt policies in accordance with the principles that the marginal cost (MC) of production should equal the additional or marginal revenue (MR) to be received from added sales. Since neither is affected by the firm's capitalization, price is not affected. Even in the long run, when the price must be high enough to cover all costs (fixed as well as variable), the size of the capitalization does not affect these costs. A competitive firm cannot raise its prices simply because it would like to, or because it must pay more in interest and dividends. The monopolistic firm charges its optimum price (what the traffic will bear) regardless of its securities outstanding.

In the preceding discussion we have assumed an absence of price regulation by government. How about railroads and public utilities where maximum rates are set by government, not by management? Here again, the answer would seem to be mainly in the negative. If the regulatory commission is effective, it will certainly not set rates so that a utility can pay interest and dividends on an inflated capital structure. The usual rule is that rates should be high enough to cover operating costs and taxes, and yield a "fair return on the fair value" of the property. Courts, since Smyth v. Ames (1898), insist that the return shall not be less than that. Neither "fair return" nor "fair value" should be materially influenced by capitalization. The first usually gives recognition to the yield on invested capital with comparable degrees of risk, or is set by a rule of thumb at a rate such as 6 or 7 per cent. The fair value is usually based on an inventory of all useful physical property and working capital,

valued either at cost at the time of acquisition (original cost) or cost at the date of valuation (reproduction cost). However much a utility would like to, and frequently does, cite its capitalization as a measure of value, it should not be taken as such a measure. Regulatory commissions, of course, realize the inappropriateness of capitalization as a measure of value, but it is not always entirely irrelevant. Suppose a utility is overcapitalized to such an extent that at reasonable rates (by the usual standards) it cannot earn enough to pay interest on its debt or dividends on its preferred and common stocks. If the utility ought to be extending and improving its service to the community, it is hampered by its inability to market new securities to advantage. Here the commission faces a dilemma. If it refuses to raise rates and increase revenues, needed expansion will not take place and the public will suffer. If it tries to induce the corporation to reorganize its capital structure, its credit may be impaired during the process, and capital for expansion will not be forthcoming. So, on balance, it might permit the utility to charge somewhat higher rates as the lesser of several evils. Hence, it can be said that overcapitalization might have some effect in regulated industries. That is why control of security issues has come to be considered an important part of the regulatory process.

It is also sometimes contended that by overcapitalization, regulated or unregulated monopolies can conceal their profitability and so prevent restrictive measures by public utility commissions or prosecutions under the antitrust laws. This, too, seems to imply that these government agencies are naive, incompetent, and easily fooled—which they are not. If reliance for effective regulation or disruption of monopolies is placed upon the rate of earnings or dividends per share of stock, then such regulation is a farce—too weak to justify its existence. Likewise, an investor who is misled by the size of the capitalization is so incapable of an intelligent investment analysis that nothing can save him. And the corporate management that follows unwise financial policies because it has a million shares of stock outstanding can hardly be expected to become wise and skillful merely by reducing the capitalization to one-tenth that amount.

It seems that the terms "overcapitalization" and "watered

stock" have been used to cover questionable financial practices and abuses that could not be approved on either ethical or moral grounds.) But deceit, misleading statements, improper accounting reports, fraud, speculative greed, and gross disregard of the welfare of stockholders and the public that all too frequently occurred in the post-Civil War period were neither the result nor the cause of overcapitalization. Many of our highly successful corporations were typically overcapitalized at the outset. They succeeded because they usually were managed by men of ability, integrity, and a sense of responsibility; the size of their capitalization was not the determining factor. (If care is exercised to avoid the wrong kind of capitalization—particularly excessive bond issues—the total capitalization is not of prime significance to the corporation, the investor, or the consuming public.

REFERENCES FOR FURTHER READING

Bonbright, J. C. Railroad Capitalization. (New York: Columbia University Press, 1920).

Daggett, S. Railroad Reorganization. (Cambridge: Harvard University Press, 1908).

Dewing, A. S. Corporate Promotions and Reorganizations. (Cambridge: Harvard University Press, 1914).

Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book II, Chs. 6, 7.

Dodd, David L. Stock Watering. (New York: Columbia University Press, 1930).

Hoagland, H. E. Corporation Finance. (New York: McGraw-Hill Book Co., Inc., 1947), Ch. 19.

Husband, W. H., and Dockeray, J. C. Modern Corporation Finance. (Chicago: Richard D. Irwin, Inc., 1948), Ch. 12.

Mead, E. S., Jeremiah, D. B., and Warrington, W. E. The Business Corporation. (New York: D. Appleton-Century Co., Inc., 1941), Ch. 19. Ripley, W. Z. Railway Problems. (Boston: Ginn & Co., 1913), Ch. 4. Ripley, W. Z. Railroads: Finance and Organization. (New York: Long-

mans, Green & Co., 1915), Chs. 6-8.

Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century Co., Inc., 1942), Ch. 27.

Chapter 9

TYPICAL FINANCIAL PLANS FOR INDUSTRIAL, PUBLIC UTILITY, RAILROAD, AND FINANCIAL CORPORATIONS

The general principles governing the capitalization of the corporation have been enumerated. In practice, these principles involve decisions as to how the capital can be most economically and safely raised, and still allow for the financing of expansion. Moreover, capitalization must provide for the inevitable unforeseen events that frequently shape the destinies of dynamic business concerns. Actually, the capital structures of many corporations do not always represent a perfect balance of the factors discussed in Chapter 7, and it might be helpful to turn our attention briefly to the way in which American corporations have in fact, raised their capital. Because of the differing characteristics of firms serving in different fields, any aggregate data are merely suggestive of the broad outlines of corporate financial policy.

About 384,000 corporations filed federal income tax returns, with balance sheets, in 1942. These represented all types of business: industrial, commercial, financial, and public service. Together they owned current assets valued at \$252 billion and fixed assets at \$108 billion, or a total of \$360 billion. They had financed only about one-seventh of this amount (\$52 billion) by issuing bonds, notes, or mortgages, and less than one-twentieth (\$17 billion) by obtaining credit from their suppliers. However, the largest indebtedness (\$151 billion), representing over two-fifths of the total assets, consisted of "other liabilities," such as bank deposits, legal reserves, trust accounts, and other items owed by financial corporations to depositors, policyholders, and others who supplied them with capital. Thus, in the total indebtedness of business, bonds and notes are not as important as

is commonly supposed. The equity capital was made up to a small extent of preferred stock outstanding (\$15 billion) but mostly of common stock (\$66 billion) and surplus (\$58 billion). To sum up, all corporations had \$220 billion of debt capital as against \$140 billion of equity capital; thus debt represented about three-fifths and equity capital about two-fifths of the total capital. Much of the debt was in the form of deposit liabilities of banks and reserve liabilities of insurance companies. The indebtedness of nonfinancial corporations as a whole was moderate, but it varied considerably as among industrial, public utility, and railroad corporations.

Capital Structure of Industrial Corporations.—Industrial corporations have in practice raised a large part of their capital by common stock issues and the reinvestment of earnings. The main reason for this is the commonly held notion that in this field the risk is great, the competition severe, the human factor predominant, and the outcome of any individual enterprise uncertain. Absent are the durability, permanency, and profitability that are supposed to attach to banking, public service, or railroad operations. Moreover, investment in physical property is likely to be small and mortgages are therefore not appropriate. Only recently has the investment market recognized the genuine investment merit of industrial bonds, and partly as the result of this recognition and partly because of the generally unsatisfactory level of common stock prices during most of the 1930's and 1940's, there has been a tendency in recent years for industrial corporations to issue bonds or preferred stocks. Nevertheless, many corporations cannot be convinced that it is good policy to incur long-term indebtedness. There are thousands of corporations that have no bonds or preferred stock outstanding. Even where bonds are issued, they are frequently retired at an early date.

In most industrial corporations, bonded indebtedness is looked upon as a temporary situation, to be endured if necessary or highly profitable, but to be liquidated as soon as it is feasible. Although precise recent figures are not available, it is probably safe to say that not more than 15 to 20 per cent of the capital

structure of industrial corporations is made up of bonds; a similar proportion consists of preferred stocks; thus from 60 to 70 per cent is represented by common stock and surplus. In general, the smaller corporations—those with assets of \$1 million or less —have little bonded debt, partly because it is not easy or economical to market small issues and also because such concerns may be new or engaged in a highly competitive industry where the element of risk is too great to warrant the issuance of bonds. It is the larger, well-established corporations that are more likely to be able to sell bonds. These tendencies are clearly evident from statistics for manufacturing corporations released in November, 1948, by the Federal Trade Commission and the Securities and Exchange Commission. Total assets of \$103 billion were offset by \$72 billion of stock equity (capital stock plus surplus), \$21 billion of current liabilities, and \$9 billion of longterm debt (9 per cent of total assets). The smallest corporations had less than 5 per cent of assets represented by funded debt.

When industrial corporations issue bonds, certain restrictions are likely to be observed. Ordinarily, an industrial bond issue is thought to be excessive in size if it amounts to more than onehalf of the capital assets, or if its interest requirements exceed one-third of its average recent earnings in good and bad years. To be of reasonably good quality, earnings should be adequate to cover interest with some margin in the poorest years. Sometimes emphasis is placed on the amount of net working capital; the rule of thumb is that bonded debt should not exceed the current assets after current liabilities have been deducted. The logic behind this is clear. Double coverage of debt by fixed assets insures that the stockholders will put up at least half of the capital for permanent plant as well as part or all of the current capital. This provides a cushion against a shrinkage in the value of the assets and makes it more likely that in case of trouble the bondholder's principal will be protected. However, the well-known fact that the value of fixed capital melts away when the corporation can no longer operate profitably frequently makes this protection illusory and serves to emphasize earnings coverage, which is probably the most important factor of all.

Current asset position relative to current liabilities and

bonded debt is important as a measure of the immediate solvency, the ability to meet interest charges, and the minimum amount for which the corporation's assets could be liquidated to meet the bondholders' claims. Actually, even though current assets are more likely to liquidate near their book values than fixed assets. this is a doubtful protection. If the firm is successful, it will not be liquidated. If it is unsuccessful, it is likely to go through bankruptcy or reorganization rather than be liquidated. In any event, the history of corporate failure amply demonstrates that a corporation will not default on its bond agreement until it has exhausted every resource to avoid default. In the process, working capital is exhausted and current debt accumulated so that the bondholders' protection is wiped out. This is the story over and over again. Nevertheless, obeisance is still made to assets, fixed and current, as a basic consideration in bond issues, and such rules of thumb, whether valid or not, must be given a certain amount of respect. It cannot be too emphatically repeated that the capacity to earn is the foundation of the value of the enterprise, upon which is based the welfare of the bondholder and the stockholder alike. If earnings disappear, then values shrink, current capital evaporates, and the bondholder is left to fare as best he can in reorganization.

It is one of the anomalies of industrial finance that practice varies from the precepts of theory. It has previously been pointed out that many of the strongest firms have little debt. although their credit would entitle them to sell bonds on a 3 per cent interest basis at the present time. On the other hand, a casual survey of corporations engaged in manufacturing and trade would seem to indicate that the very corporations which should not issue bonds frequently do so. This is another way of saying that bond financing by industrial corporations is commonly a matter of necessity, not of choice. The widespread use of bonds in such uncertain industries as coal and coke, steel, meat packing, railway equipment, tire and rubber, and textiles is illustrative of necessity. On the other hand, stable industries, like chemicals, shoes, drug chains, mail-order houses, and snuff manufacturing have made little use of bonds, although other fairly stable earners, like dairy companies, oil companies, department stores, cigarette manufacturing companies, and breadbaking concerns, have issued bonds rather frequently. Such unstable earners as the automobile, agricultural implements, mining and metals, and leather industries have used bonds sparingly, if at all.

Because preferred stock does not carry fixed charges and the principal does not become due at a definite date, it is sometimes used with or instead of bonds to obtain a balanced capital structure. Its limited return permits profits from trading on the equity. Its priority of claim over common stock makes it appeal to more conservative investors, and sometimes the absence of voting power makes it a vehicle for raising additional capital without jeopardizing control. It has been widely used by industrial corporations to attract senior capital.

Because of the contingent nature of its dividends, preferred stock can prudently be issued in larger amounts than bonds relative to both assets and earnings. There are few hard and fast rules governing the issuance of preferred stocks by industrial corporations. The most conservative rule would be that the amount of preferred stock should not exceed the limits suggested above for bonds, but in practice it is usually safe to issue preferred stock in excess of one-half of the value of the tangible assets. More attention is likely to be paid to the size of the earnings relative to dividend requirements on preferred stock than to asset coverage, and the rule of thumb is that earnings should be at least twice dividend requirements, on the average, over a period of years.

During the Great Depression of the 1930's, because of the low level of common stock prices many corporations were forced to sell bonds or preferred stocks if they wished to raise new capital and could not draw upon their own capital resources in the form of depreciation reserves or reinvested earnings. Actually, most of them did not need new capital since it was a time when private capital formation was in the doldrums. What corporate financing there was took the form of bonds or preferred stocks issued for the purpose of refunding maturing obligations or to obtain lower interest rates. The drop in interest rates made it attractive to call in old bonds and pay them off with the proceeds

of the sale of a new issue. The drastic decline in bond yields and preferred stock yields as well clearly depicts this trend. The effective interest or dividend rates on all newly issued domestic bonds and preferred stocks at selected dates were: 1

	All Domestic Corporation Bonds	All Preferred Stocks
1921	7.23%	7.54%
1925	5.75	6.85
1929	5.34	6.11
1933	5.23	no data
1937	3.59	4.66
1941	3.07	4.61
1945	3.00	4.02

While the cost of borrowing by the use of bonds and preferred stock has been consistently decreasing in recent years, the prices of industrial common stocks have been erratic and lower. Measured by the Dow-Iones average, industrial stocks stood at about 75 in 1921, reached 160 in 1925 and hit the all-time boom peak of 381 in 1929. Then the course was generally downward, with intermittent periods of mildly high prices. By 1933 stock prices were again at 75, the level of 1921; the bull market of the middle 1930's brought a high of 196 in March, 1937, followed by a sharp reaction to 115 in November of that year, a recovery of 158 in 1938 and 1939, and a gradual decline to the 125 level in 1941, after which a new low of 93 was made in 1942, followed by a gradual increase to 190 in 1945. Thus, market conditions were much more favorable to senior securities than to common stocks throughout most of the 1930's and early 1940's. The natural result is reflected in a report by the Securities and Exchange Commission on all securities registered for sale in the years 1937-40.2 During this period there were 230 issues of secured bonds totaling \$2,958 million, 135 issues of unsecured bonds totaling \$1,861 million, 332 preferred stock issues totaling \$766 million, and 735 common stock issues totaling \$1,068 million. Common stock represented less than one-sixth of the total issues. In 1948 all corporations issued \$6,531 of securities, of

¹ Moody's Manual of Public Utilities, 1947, p. a5.
² Securities and Exchange Commission, Statistical Series, Release No. 568, 1941.

which 83 per cent were bonds and notes, 7 per cent preferred stocks, and 10 per cent common stocks. Industrial and public utility issues made up the bulk of the total. The small proportion of common stock financing is notable, particularly for a year of great prosperity.

Capital Structure of Public Utilities.—The financial plans of public utilities are likely to be more uniform since the industry is less heterogeneous than the catch-all classification called "industrials." It is true that there are differences between them in age and state of economic vigor, and there are wide variations in the degree to which each of the utility divisions can qualify for a given financial plan. It is well known that a water-works system, one of the oldest of the utilities, is also the most likely to show consistent earnings. Manufactured gas has been used since 1806 and still provides an essential service for cooking and heating, but it seems to have reached a stability indicative of maturity and its earnings have shown little evidence of growth. Natural gas, on the other hand, has grown very rapidly and shows no indications of reaching maturity. And so it goes. Electrified street railways and electric light and power have performed essential services for well over half a century but their destinies have been as different as night and day. Street railway companies began auspiciously and grew rapidly, until in 1917 they operated nearly six times as much trackage as in 1890. Since 1917 their lot has generally been a hard one. Beset by the private automobile, the jitney, and the bus as competing carriers of the public, and by rising costs of World War I, with rigid fares, most private companies were unprosperous in the prosperous twenties and many became financial failures in the depressed thirties.

On the other hand, the electric light and power companies continued to grow despite the inflation of World War I, the depression of the thirties, and the New Deal promotion of public power projects. They have become the giants in the field, having nearly three times the assets of telephone companies, the next largest utility group. Electric light and power companies expect to spend \$5 billion for plant expansion in the period 1948-53. The

telephone industry also continues to grow, while its communications rival, the telegraph, seems to show no consistent earning power or growth.

It is not our purpose here to elaborate on the differences, but rather to point out the factors that make public utilities rely on bonds and preferred stock rather than on common stock or reinvested earnings as the primary sources of capital. Briefly, these factors are: (1) Utilities sell necessary services, assuring relatively stable sales; (2) the services are perishable and must be bought constantly as used; (3) the price of the service is low relative to customers' income; (4) there is little likelihood of inventory losses or gains, or losses from bad accounts receivable; (5) earnings are limited by regulation, therefore not much financing can be done by the reinvestment of earnings; (6) utilities usually enjoy a legal monopoly, although they may experience competition from substitute services, like gas and electricity for cooking, gas and fuel oil for heating, the private automobile and the street car for personal transportation; (7) capital requirements are large relative to gross revenues (low capital turnover); (8) most of the property is fixed, thus lending itself to mortgage bond issues; (9) even in the construction of a new utility, costs, sales, and profits can be forecast with a reasonable degree of accuracy; (10) the necessity to render continuous service and to extend the service to new areas calls for ample capital, and a regulatory policy that permits the industry to attract capital.

Each of these factors applies to some extent to each of the utility industries, but the main influences shaping capital structures have probably been: (1) the stability of earnings; (2) the general recognition of the high quality of utility bonds and preferred stocks; (3) a growing market for utility bonds among such financial institutions as banks and insurance companies; (4) general market conditions in the 1930's which favored bonds over common stocks; (5) the reluctance of holding companies to endanger their control over subsidiaries by selling new voting stock (nonvoting stock lost repute after 1929) to the public.

The proportion of bonds to total capitalization should be about 50 per cent to 60 per cent. Actually, bonded and other debt made up 47 per cent of gross capitalization in 1946. The Securi-

ties and Exchange Commission has recognized this proportion as a workable maximum and usually insists on a scaling down of excessive debts in utilities under its jurisdiction. Its "ideal" capital structure for electric light and power companies is 50 per cent bonds, 25 per cent preferred stock, and 25 per cent common stock and surplus. This means that assets will cover debt twice over, and the earnings on the property (permitted by regulatory commissions) will cover interest requirements more than twice.

The rule of thumb is that interest requirements should be earned twice in the most recent years. When bonds can be issued at very low rates of interest, this double coverage would be possible even if the bonded debt exceeds 50 to 60 per cent of the assets, because utilities are permitted to earn from 5 to 7 per cent on their total investment. All electric utilities earned interest on their total funded debt $4\frac{1}{2}$ times in 1946 and $3\frac{1}{4}$ times in 1944. Since working capital is relatively unimportant in utility operations, and there is a constant and dependable inflow of cash, permissible bond issues bear no relationship to working capital.

Preferred stocks are frequently, but not invariably, issued by utilities. In the typical electric light and power company, they make up from 10 to 25 per cent of the capitalization. In 1946 they amounted to 15½ per cent of electric utility gross capitalizations. They are issued to raise funds from individuals who are free to invest in stocks but wish something more secure than common stocks. Ordinarily, dividends are cumulative. Sometimes, the stocks may be called by the issuing corporation, but early retirement via sinking funds is not ordinarily contemplated. The rate of dividend is from 1 to 2 per cent above the interest rate on bonds of the same company, thus affording a higher return to investors who are willing to incur somewhat higher risks. Conservative limits to preferred issues are usually set by the principle that the preferred issues should be covered twice by the assets and that over-all interest and preferred stock dividend requirements should be covered at least twice by the net earnings. The investment record of preferred stocks in operating companies has been quite impressive, but that of holding companies leaves much to be desired.

Common stock and reinvested earnings provide the remainder

of the capital requirements for public utilities. Typically, this is from 20 to 40 per cent of the capital structure, although the Boston Edison Company, an exceptional case, has supplied 69 per cent of its capital in this way, and the American Telephone and Telegraph Company has raised a good part of its capital through stock issues. Electric utilities as a whole, up to 1946. had raised 27 per cent of gross capitalization by common stock issues and 10 per cent from surplus. Because of the relative stability of earnings, possible profits from "trading on the equity"—arising from the leverage provided by a large amount of prior capital with fixed rates of return—and the gains from growth, common stocks of some operating utilities have come to achieve a semi-investment position. Ordinarily, they yield the investor more than the preferred stock and have greater possibilities of capital gains (and losses). As the investment position of common stock improves, the advantages of issuing bonds or preferred stocks become smaller and smaller. A reversal in market preferences for bonds and an upward movement in common stock prices over an extended period could result in a marked change toward equity capital in utility capital structures. In recent years electric utilities have earned from about 7 to 11 per cent on their common stock equities.

Holding company common stocks in general are much more risky and speculative than those of operating companies. The pyramiding of the holding company structure accentuated the leverage already inherent in the large bond and preferred stock issues of the operating companies. As each successive holding company sold its own bonds or preferred stocks to buy stocks in the companies below it, the total amount of fixed-return capital ahead of holding company common stocks increased the higher the pyramid was built. And the whole structure was bottomed on the common stock of the operating companies. As long as the operating companies were profitable and had good prospects of growth, the stock of the top holding company magnified the profitable prospects many times, since in its attenuated position it was the claimant to all residual earnings. In the prosperous 1920's, holding company common stocks reflected the magnified prospects of future profitability by advancing to fantastic levels.

And when, with economic recession and adverse government policies, leverage began to work in reverse, the earnings available to the preferred and common stocks of holding companies shrank sharply or almost disappeared, with only moderate decreases in operating company earnings, and stock prices collapsed. For example, the \$6 preferred stock of Electric Bond and Share Company, one of the largest holding companies, fell from a high price of \$110 a share in 1929 to a low price of \$19 in 1932; the common stock declined from \$189 a share in 1929 to \$6 in 1932, after which it was reverse split, or "split-down," at the ratio of three old no-par shares to one new share (\$5 par value). The new stock sold at a low of \$5 in the same year, or the equivalent of less than \$2 for the old no-par common stock.

In recent years holding companies have suffered from the shock of control and simplification, imposed by the Public Utility Act of 1935 (with its "death sentence" for superfluous holding companies), and their stocks are probably undervalued today because of their poor reputation. This experience might well serve as the text of a sermon on how excessive pyramiding and unsound financial practice, coupled with public criticism and restrictive legislation, can bring disrepute and loss to security holders in an industry that at the operating level is fundamentally stable and reasonably prosperous.

The financial practices of electric light and power companies can be taken as typical of other classes of utilities, although each has its peculiar problems. The telephone industry, for example, is dominated by one company, the American Telephone and Telegraph Company, which has leaned heavily upon equity financing. In 1945 the Bell System had only \$1.3 billion of debt outstanding as compared with \$2.6 billion of capital stock and surplus, the debt being one-third of total capitalization plus surplus. The company now follows a policy of issuing convertible bonds to finance expansion, a policy which corporations like the Union Pacific Railroad Company and American Rolling Mill Company have used successfully to take advantage of a market temporarily more favorable to bonds than to stock, but with the ultimate prospect of conversion into stock.

The telegraph industry, a competitor to telephones in some

types of communication service, is also dominated by a single company, Western Union, which has had a much less profitable earnings history than its rival. In 1945 telegraph and cable companies had long-term debt of \$91 million and capital stock and surplus of \$193 million, indicating considerable emphasis upon equity financing.

Natural-gas companies, whose growth has outstripped their sister industry, manufactured gas, have developed in recent years when bond financing was cheaper than stock financing. This has left its mark on their capital structures. In 1946 these companies had \$887 million of bonds outstanding, as compared with \$1,266 million of capital stock and surplus. Their stable earning power and prospects for growth have permitted substantial bonded indebtedness.

It is impossible to tell whether conditions in the future will vindicate utility capital structures with sizable long-term debt. This is a particularly intriguing question since most utility corporations, except American Telephone and Telegraph, look upon debt as permanent and usually refund maturing bonds by new issues. Absent is the historical impatience of most industrial corporations to get rid of bonded debt at the earliest opportunity. This complacency might well be jarred by technical developments, such as atomic energy, which could make their plants and service obsolete, as street railway corporations and their bondholders have found to their sorrow. Government competition through power projects allied with river developments, as in the Tennessee Valley and the Pacific Northwest, may serve to remind us that there is nothing inherent in public utility operations that makes adequate earnings inevitable. Corporate managements and investors can never be certain of anything. It is possible that because of unforeseen events the capital structures of public utilities may become as bond-heavy as they now are in the steam railroad and street railway fields; but such events are still beyond the horizon.

Capital Structure of Railroads.—The financial policies of railroads are more complicated and historically more dramatic than those of industrial or public utility corporations. Although railroads are, and probably will continue to be, among our basic economic institutions, since they provide the cheap overland transportation without which our national economic efficiency would be impossible, they no longer require vast amounts of capital for expansion. In recent years more miles of railroad have been abandoned than have been built. But that does not mean that railroads as a whole now have a surplus of liquid capital, which will obviate any new financing. Far from it! Much capital is required for reconstruction, for new equipment of all kinds, and for the intensive development of the existing plant. During the past quarter of a century the railroads have spent over \$13 billion for plant improvements, although the total miles of line operated has decreased from 250,000 miles to 225,000 miles.

Despite their lack of growth in mileage, railroads represent an imposing segment of American economic life. Their total assets (after depreciation) in 1945 amounted to \$26 billion, and they had \$16 billion of securities outstanding in the hands of private and institutional investors. Together they have nearly a million stockholders, and probably many more millions are directly or indirectly (through banks, insurance companies, etc.) interested in railroad bonds. Over 1,300,000 employees earn their livelihood from the railroads, and in 1947 received \$4.3 billion in wages. If total assets can be taken as a measure of size, our railroads are one and a half times as large as the entire electric light and power industry, four times as large as the telephone industry, and eight times as large as the growing natural gas industry.

The present railroad systems are large aggregates resulting from a process of combination and consolidation that has gone on for the past seventy years or more. Although about a thousand separate railroad corporations are in existence, less than 150 Class I companies—each with an operating revenue of over \$1 million—account for about 95 per cent of total mileage and revenues.

The process of consolidation has given to existing railroads one of their most outstanding financial characteristics—complicated capital structures. Each small line taken into the extensive systems had its own bonds, common stock, and, occasionally, preferred stock outstanding. When a small company was taken over by a long-term lease of its property by a larger system, the latter commonly guaranteed (by a separate contract of guaranty) to pay interest and principal on the bonds and a stipulated rate of dividend on the common stock of the new subsidiary; hence guaranteed securities came into being. If instead of leasing the property it was purchased outright, the parent assumed the bond obligations of the subsidiary, and paid off the corporation or its stockholders in cash or in securities of the parent company.

As systems were improved and expanded, new capital was raised by issuing new bonds on existing property. Ordinarily, these were secured by junior mortgages that "blanketed" the property of subsidiaries that previously were separate entities. This junior mortgage financing was made necessary because the underlying mortgage issues of the subsidiary companies were commonly closed and no new bonds could be issued under them. As the needs for new capital continued to grow, new issues of bonds were sold. Custom dictated that these be secured by a mortgage on the physical property.

With the exception of income bonds, unsecured issues have never been widely used by railroads. The result is that some pieces of trackage are covered by one to four (or more) layers of mortgages securing separate bond issues. To this can be added income bonds, a sprinkling of guaranteed bonds and stocks of subsidiaries, perhaps a terminal bond issue or two jointly guaranteed with other railroads, an assortment of equipment trust certificates (through which virtually all rolling stock is now acquired), a preferred stock issue (probably noncumulative and issued in a previous financial reorganization) and a common stock issue (with \$100 par value) and you have a picture of the capital structure of a typical railroad. The chances are good that the original common stock was long ago wiped out or greatly reduced through financial failure and reorganization.

The early history of railroad construction involved no complexity of financial policies. At that time railroads were built as civic improvements, with loans and grants of money or other property. Cities and states along the Atlantic seaboard, realiz-

ing that their future prosperity was bound up in trade and commerce with the rich interior areas, had early promoted projects for improved transportation by water and land. The Erie and the Chesapeake and Ohio canals and numerous commercial highways or turnpikes were looked upon as public projects that would eventually repay their cost through improved trade and expanded industry. Public assistance to the railroads was but a continuation of this policy. The original lines of the Baltimore and Ohio Railroad were backed by the city of Baltimore, those of the Pennsylvania Railroad by the city of Philadelphia, and so on. Usually the capitalization was simple. Bonds were sold to the public or to city or state governments, which in turn sold their bonds to the public. Common stock was sold to the general public and to businessmen in community drives that used the high-pressure methods and emotional appeals characteristic of the war bond rallies of our generation.

Ordinarily, early capital structures of railroads were not complicated even by issues of preferred stocks. These were to come later—in the days of disillusionment and financial crisis that frequently followed the early enthusiasm. Many of these roads failed, partly because they were built in advance of economic development and had early traffic volumes insufficient for their financial support, and partly because some of them were not soundly conceived as economic enterprises in the first place.

Another characteristic of early railroad finance was the use of the construction company. This applied particularly to the building of western or "transcontinental" railroads after the Civil War. By that time railroads had emerged as private rather than public enterprises, but their public nature was still evident in large grants of land, first by the states and later by the federal government, which granted not only rights of way, but in addition several sections (square miles) of land for each mile of track constructed. Although the land was worth only a dollar or two per acre at the time of the grant, it was expected that it would increase in value as settlement followed the railroad. This incentive was needed to induce construction in the wilderness where no traffic existed and the outcome was based largely on hopes.

Having received its land grant, the railroad would try to raise

capital by the sale of stock and bonds to be secured by the completed roadbed and terminals. But public interest in these securities was frequently lukewarm, and some method of disposing of them to finance construction was necessary. That became the primary function of the construction company. Ordinarily, it was organized as a separate corporation by the promoters and dominant stockholders of the railroad. These "insiders" contributed to their private construction company enough money to pay for the actual construction of several miles of the road. Before doing this they had arranged with the railroad company (which they also controlled) to let a contract for the construction of a large stretch of railroad (as much as 100 miles) at a certain price per mile, the payment to be made in the bonds and stock of the railroad, rather than in cash. The price in securities was fixed high enough so that the actual cost of construction could be covered by the resale of the bonds received; thus much of the stock remained in the hands of the construction company, and with it control over the railroad. If the actual cost of constructing a railroad was about \$30,000 a mile, the contract might call for the railroad to pay \$30,000 in bonds and \$10,000 in common stock for each mile of road completed. The construction company would finance the first stretch of road from its own resources, then turn it over to the railroad company for \$30,000 par value of bonds and \$10,000 par value of common stock per mile completed. It would hope to sell the bonds (possibly with a bonus of common stock) for par, thus reimbursing itself for its outlay and retaining most of the common stock as a profit. The process would be repeated until the line was completed. If the bond sales were successful and not too much common stock had to be sold or distributed with the bonds, the construction company would find that it had received back its original capital and, if the stock was worth more than a nominal amount, a possible profit and continued control of the railroad company through ownership of a majority of its stock. The construction company might then be dissolved and its assets (railroad stock) divided among its owners, or it might continue as a sort of investment or control vehicle for its owners.

Probably the most notable uses of the construction company

were in connection with the building of the Union Pacific and Central Pacific railroads which were joined in Utah in 1869 to provide the first railroad link with the Pacific Coast. A group of Union Pacific stockholders headed by T. C. Durant, and later the Ames brothers, bought control of a corporation shell known as the Pennsylvania Fiscal Agency because its charter contained the power to own securities in other corporations. The name was changed to the Crédit Mobilier of America, and to it was assigned a contract to construct 100 miles of road through Nebraska for the Union Pacific Railroad at \$50,000 a mile. The contract was later extended to cover additional mileage, and a new contract for still further construction at from \$42,000 to \$96,000 a mile was let. The Crédit Mobilier was paid in the bonds and stock of the Union Pacific as construction of each piece of road was completed, and enough Union Pacific bonds were sold by the Crédit Mobilier to the investing public to pay for actual construction costs. When the road was finished, the actual cost of building it was estimated to be about \$60 million, but \$74 millions of bonds (including \$27 million of U. S. government bonds) and \$38 million par value of stock were outstanding against it, indicating a large overcapitalization if measured by cost.

On the surface, it would seem that the promoters of the Crédit Mobilier had been guilty of unconscionable gouging of the Union Pacific whose interests they, as directors and managers, were supposed to protect. But perhaps the size of their true profits can be estimated only when it is realized that the bonds were sold for much less than par, and the stock had only speculative value at best, based on no tangible property, but on hopes that a railroad built through uninhabited prairies and mountains could operate profitably. In his History of Union Pacific Railway, Henry Kirke White estimated that the \$74 million of bonds brought in cash of \$63 million, which was \$3 million more than the actual cost of construction. Taking the common stock at a value of \$30 per share, or \$11 million, and adding about \$3 million for the sale of trackage to the Central Pacific, a total profit of \$17 million, or about 28 per cent of the cost of construction, was estimated for the construction company. Whether this was excessive or not must be judged in light of the uncertain

character of the project at that time. The evidence indicates that despite government financial help and the grant of ten sections (square miles) of land per mile of road, little progress was made in the first two years of the Union Pacific's life. It was probably not a mere coincidence that energetic construction activity began after the group of insiders saw a chance to make large personal profits by organizing their private construction company to "build" the road and in effect get most of the stock in the railroad for nothing except their services in disposing of the securities.

Perhaps the Union Pacific, Central Pacific, Northern Pacific, and other roads benefiting from large land grants should not have been built as early as they were, but it is doubtful if private capital could have been attracted to enterprises fraught with such uncertainty and risk without the hope of large profits. This hope, together with the responsibility for the sale of the railroads' securities and the insulation of the parent company against certain kinds of risks and excess charges that might be incurred if it did the work directly, was the construction company's only legitimate reason for existence. Whether it justified its existence or was simply a parasite will probably always be a matter of dispute.

It might be worth while here to record that excessive bonded indebtedness was the worst financial result of this type of financing. Over the years, railroad capitalizations have been remodeled. Financial reorganization has come to most of our western and southern railroads one or more times; and some of the reorganized companies are among our strongest railroad systems. Fixed charges have been reduced and stocks substituted for bonds. In addition, railroads have "plowed back" billions of dollars of reinvested earnings to bring the cost of their properties into line with their capitalizations.

The construction company device has not been used by railroads for many years and its interest is largely historical. If by some miracle we should enter upon a new era of extensive railroad construction, it is doubtful if it would be necessary, wise, or permissible to resort to the construction company, which was essentially a pioneering instrument of the frontier. The construction company device has been used rarely in other fields of activity, although the Federal Trade Commission in its comprehensive report on public utility holding companies uncovered one case in which a holding company, through a construction subsidiary, built an electric generating plant for an operating subsidiary at an actual cost of \$4,500,000. For this the operating subsidiary paid the construction company \$7,500,000 in bonds and \$2,500,000 in stock. The bonds were sold for \$6,500,000, giving the construction company a cash profit of \$2 million and the stock for nothing. Apparently, such cases were quite unusual.

The worst feature of the railroad construction company device was not in the overcapitalization that it almost inevitably caused, but in the excessive reliance upon bond financing, resulting in fixed charges that could not always be earned with the small volume of traffic that was developed in the early years. This factor, together with a near mania to expand mileage and extend systems, resulted in many railroad failures and reorganizations, particularly in the crises of 1873 and 1893. There was a new epidemic of failures in the depression of the 1930's, although these were due less to loose financial practices than to the drastic shrinkage in traffic, new competition from automobiles and trucks, lack of control over costs, and inability to raise rates.

To sum up, then, the typical railroad in the early days was financed largely by bonds and stocks sold to interested governments or individuals for cash. With the rapid growth of railroad construction activity, particularly after the Civil War, a change took place. With the use of the construction company or without it, mortgage bonds were commonly issued to cover the actual cost of construction and common stock was used to represent hoped-for profits above operating expenses and interest charges. This stock was given to promoters, bankers, lawyers, and others for services, and was sometimes used as a "bonus" to make bonds more attractive, thus giving the investors the presumed safety of a bond and the speculative chance to share in profits of a common stock. Stock therefore represented the intangibles of a new business and was used to make easier the

process of promotion. This was fairly typical of industrial and early public utility finance as well as of early railroad finance.

Since 1920, new issues of railroad securities have been subject to the control of the Interstate Commerce Commission. In addition, the amended bankruptcy laws (Section 77) give the commission authority to mold the capital structures of railroad corporations going through reorganization—a power which has been used in practice to reduce fixed charges drastically. Commission-approved plans also reduce the total capitalization by declaring worthless the preferred and common stocks of failed companies and squeezing out that part of the capitalization. Railroads representing about one-third of our total mileage are undergoing or have undergone this process.

The continuous reinvestment of earnings, when there are earnings, has also tended to eliminate overcapitalization among the railroads. The book value of all railroad property (before depreciation) increased from about \$15 billion in 1910 to nearly \$26 billion in 1936. About \$4 billion of this increase was financed by bonds, about \$2 billion by stock, and the remaining \$5 billion by reinvested earnings. By 1945 total railroad property investment was \$28 billion (\$23 billion after depreciation). Against this there were outstanding, in the hands of the public, railroad securities with a total par value of less than \$16 billion, of which funded debt amounted to \$8.5 billion and par value of capital stock to \$7 billion. Total book surplus accounts of all railroads amounted to about \$4.5 billion. Thus during the past three decades there has been a gradual tendency to increase the position of equity capital, with a corresponding decrease in the ratio of debt to total capitalization (including surplus). In 1916, all railroads had about \$10 billion of funded debt outstanding. This increased to a peak of nearly \$12 billion by 1930, from which point it was gradually reduced to \$10 billion in 1942 and to \$8.5 billion in 1945. Even while the absolute amount of debt was growing in the 1920's, its relative importance was declining since gross investment in railroad property increased from \$19 billion in 1916 to \$26 billion in 1929.

Despite a marked increase in railroad earnings during and after World War II, confidence in their common stocks is at

present at a low ebb. The postwar relapse in earnings due to the lag of rate increases behind rising labor and material costs found most railroad stocks depressed in price and selling at heavy discounts from par. Since 1929 scarcely a single new issue of stock has been sold by railroad corporations and unless conditions of regulation, competition, or the level of costs reverse their tendencies of the past two decades, railroads will find themselves in a position where the financial "fat" built up during the war years has been consumed by expenditures for modernization and improvement, and they again may be forced to depend upon bond and equipment trust issues to supplement the small amount of new capital that can be provided by the reinvestment of earnings.

Capital Structure of Financial Corporations.—Banks and insurance companies almost invariably have simple capital structures, consisting only of common stock with par value. The reasons are not far to seek. A commercial bank accepts money from the public and is required by law to pay it back upon demand. Thus banks in effect obtain about 90 per cent of their funds by debt creation, debt that is mostly due upon demand. Savings banks and other banking institutions accepting deposits are in much the same position, although legally they can require notice of deposit withdrawal. Incidentally, this is the only type of corporation that advertises its debts (deposits) as if they were a source of strength.

To protect the public, banking is regulated by the federal government and the states. A new bank can be started only after the project has been investigated by the banking authorities and a charter is granted. Minimum capital requirements are established (for national banks it is \$50,000) and cash must be paid in before a bank can accept deposits from the public. Minimum reserve requirements are prescribed to insure liquidity. Investment is limited to the highest-grade securities. No more than a limited amount can be loaned to any one borrower, and loans must be of reasonably short duration. Obviously the sale of bonds would be inconsistent with these protections to the depositor and would add to an already heavy indebtedness.

Ordinarily, banks are expected to maintain a reasonable ratio

of owned capital (capital stock and surplus) to deposits so that any losses in assets will be absorbed by the owners' equity and leave the depositors' claims unimpaired. If this protective cushion gets too thin, it should be replenished by the sale of new stock or the reinvestment of earnings until the proper capitaldeposit ratio is re-established. The exact ratio of capital to deposits has varied considerably, the recent trend being downward. Twenty years ago one dollar of capital was considered proper to support five or six dollars of deposits. At present, banks are stretching each dollar of owned capital more thinly over a larger volume of deposits, and the ratio has become about one dollar of capital to twelve dollars of deposits. Banks are encouraged but not required to build up owned capital to catch up with the threefold expansion of deposits that took place during the World War II period. The lower ratio now is considered safe because banks hold a large part of their total assets in the form of United States government bonds and cash, on which losses are unlikely.

Only one departure from simple common stock capital structures has been made by our banks. That came after the banking holiday in 1933, when to restore confidence in banks, funds furnished by the federal government were used to purchase preferred stock in many banks. Even some of the strong New York banks were expected to sell preferred stock so that the stigma of weakness would not attach to banks that did so. This preferred stock was looked upon as a device to tide the banks over an emergency, and most of it was retired by repayment within a few years after the crisis.

Insurance companies are of many different types: life, fire, and casualty among others. Some are mutually owned by policyholders and some are stock (private) companies. Like banks, they accept money from the public through the sale of policies. In life insurance the policies may not mature for many years, while in fire and casualty they may mature in one or a few years. In all cases, cash payment can be demanded in the event of the loss insured against (death, fire, or accident) and in some kinds of insurance, refunds, cash surrender, or loan values may call for the payment of cash at almost any time, since premiums are paid

in advance and are in effect "owed" to policyholders until time has passed and they become "earned." The amount so "owed" to policyholders is known as "reserves" and they are by far the largest liability of insurance companies. Among fire insurance companies, this obligation to policyholders is likely to be about as large as the stockholders' equity, while in life insurance it is likely to be very much larger than owned capital. Since life companies are more strictly limited to the highest-grade investments than fire companies (which are scarcely limited at all), the smaller margin of protection is adequate.

In any case, it is strictly contrary to tradition in the United States for insurance companies to issue bonds or preferred stock to obtain capital. Like banks, they have depended upon the sale of common stock and the reinvestment of earnings to provide the capital with which to operate. Borrowed capital is obtained from depositors and policyholders.

REFERENCES FOR FURTHER READING

Bonbright, J. C. Railroad Capitalization. (New York: Columbia University Press, 1920).

Dewing, A. S. Corporate Promotions and Reorganizations. Cambridge: Harvard University Press, 1914).

Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book II, Chs. 6, 7.

Federal Trade Commission. Utility Corporations; Summary Report. (Senate Doc. 92, Part 72A, 1935).

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Chs. 11-13.

Interstate Commerce Commission. Annual Reports.

Jamison, C. L. Trading on the Equity by Industrial Companies. (Ann Arbor: University of Michigan Business Studies, 1934).

Mead, E. S., Jeremiah, D. B., and Warrington, W. E. The Business Corporation. (New York: D. Appleton-Century Co., Inc., 1941), Chs. 16-19.
Ripley, W. Z. Railroads: Finance and Organization. (New York: Long-

mans, Green & Co., 1915).

Securities and Exchange Commission. Annual Reports.

Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century Co., Inc., 1942), Chs. 15, 16.

Waterman, M. H. Public Utility Financing, 1930-1935. (Ann Arbor: University of Michigan Business Studies, 1936).

Chapter 10

THE SALE OF SECURITIES AND INVESTMENT BANKING

The final and crucial step in the financing of a corporation is arranging for the sale of the securities. For this purpose many means might be used. A corporation might sell its own issues either directly or through a subsidiary sales organization. This is sometimes done by established corporations when stockholders, employees, or customers are expected to be interested buyers. The law usually requires that new common stock issues and convertible bonds or preferred stocks be first offered to existing stockholders. This preemptive right reinforces what in many cases is good sales strategy, namely, the recognition that satisfied stockholders may provide the best market for a new issue.

Sometimes, though infrequently, a corporation will try to sell its own securities to the general public. This is usually a major undertaking, involving an expensive organization, which is justified only where the growth or expansion of the business requires a continuous stream of new issues to be sold. In some instances the security-selling organization is set up as a separate corporation. This was particularly true of public utility holding company systems during their period of rapid growth in the 1920's. For example, the firm of Henry L. Doherty and Company sold securities of companies in the Cities Service Company system, as did H. M. Byllesby Company for the Standard Gas and Electric Company system.

The average corporation, however, is not an efficient distributor of securities. Thus the typical procedure for most corporations, old as well as new, is to engage the services of the investment banker. As a matter of fact, the banker is seldom

entirely outside the scene of new security issues, for, as we have seen, he is likely to act as adviser or underwriter, even if he does not actually distribute the securities.

Nature of the Investment Bank.—A brief description of the investment bank is necessary if we are to understand its functions. In the first place it is not a bank at all, if we think of a bank as a financial institution that accepts deposits, operates checking accounts, and makes short-term loans. Nor is it like a trust company, which acts in a fiduciary capacity for others; nor like cooperative banks or building and loan associations, which sell shares and loan on the security of home mortgages; nor like industrial banks, which make consumption loans to small borrowers. Rather, the investment bank is a "merchandiser of securities." Its purpose is to buy securities, principally new issues, and sell them at an advance in price. Thus it receives a commission, or "spread," for its services, just as the retailer of shoes receives his markup or profit. Naturally the investment banker is interested in a large volume of business so that his commissions will be maximized, but he will refuse to handle securities that he thinks might cause loss and dissatisfaction to his customers and so harm future sales. A well-satisfied clientele is his most important asset.

Nor is there any typical size or capital for investment banks. Their organization is not carefully regulated by special incorporation laws, such as apply to commercial banks. Many are organized as partnerships rather than corporations, and vast numbers are little more than security dealers, operating from one- or two-room offices, with limited capital and with scant equipment.

It is easier to become an investment banker in this limited sense than to enter many professions or lines of business. No requirements of professional competency need be met, but dealer registration requirements under state blue-sky laws afford a sort of mild check on the general honesty and reputation of applicants for dealers' licenses. Under the amended Securities and Exchange Act, dealers and brokers have set up the National Association of Securities Dealers, with powers (subject to review by

the S.E.C.) to adopt rules of action and to discipline by fine, suspension, or expulsion for infractions of rules regarding such matters as reasonable commission charges, adequate disclosure of all facts to customers, and other standards adopted for buying and selling in the over-the-counter market, where thousands of different securities are bought and sold. While these regulations usually go no further than to impose on all dealers the standards usually followed voluntarily by the best houses, their general effect has been salutary. The severest penalty is expulsion, which has been imposed often enough to serve as a warning to the tempted and the weak.

In contrast to this multitude of small houses are the leading investment banks like Morgan, Stanley and Company, Kuhn, Loeb and Company, First Boston Corporation, Kidder, Peabody and Company, Halsey, Stuart and Company, Incorporated, and a few dozen of the larger concerns, employing from \$5 million to \$20 million of capital, with large operating staffs and offices located in many cities. Most of the larger firms have wholesale as well as retail departments and engage in originating, underwriting, and selling securities for well-established and generally known concerns. Like smaller houses they usually also act as brokers and execute customers' orders to buy and sell.

Investment Banks and Commercial Banks.—Until 1933 some of the largest investment banks were affiliates of commercial banks and had almost the same names. Historically the line between commercial banking and investment banking is blurred, and the early European banking institutions, like the famous House of Rothschild, furnished both short-term and long-term credits. However, American national banking laws have been rather strict in separating the two functions, preventing commercial banks from underwriting and selling corporate securities. But until 1933 this restriction was often circumvented by the organization of a separate corporation under the general incorporation laws, rather than the banking laws, with broad powers to conduct investment banking and similar business. Interlocking stock ownership or voting trusts insured control over the affiliate by the commercial bank, which could not legally own

the stock of the affiliate. Thus the National City Bank interests organized the National City Company with a capital of \$10 million in 1911, and the Chase National Bank organized the Chase Securities Corporation in 1927 with an original capital of \$2,500,000, the shareholders in both banks receiving shares. or the equivalent, in the investment affiliate. Both grew into giant institutions, the latter attaining a capital and surplus of \$115 million by 1933, when both of the companies were put into liquidation under the provisions of the Banking Act of 1933, which forbade commercial member banks to have security affiliates after Iune, 1934. This reform was prompted by abuses which the Senate Committee on Banking and Currency found had grown out of this relationship, although the record is not clear that such affiliates must inevitably result in a conflict of interest between the commercial and investment banking spheres. Security affiliates undoubtedly indulged in excesses in the speculative era of the late 1920's, just as nonaffiliated investment banks did, but there is little evidence that the excesses were greater or that the securities sold by affiliates were of lower quality than those sold by nonaffiliated banks. In fact, statistical studies tend to indicate that issues brought out by banking affiliates were as good investments as those brought out by nonaffiliated investment banks.

Another type of integration between commercial and investment banking before 1933 was found in the old and strong unincorporated (or private) banks. These banks, being free from restrictions imposed by state or national corporation charters, engaged in whatever banking practices they found convenient, expedient, and profitable. The largest was the firm of J. P. Morgan and Company, composed of twenty partners, with a net worth of \$119 million in 1929 and \$45 million in 1932. After the Banking Act of 1933 placed private commercial banks under regulation and forbade them to carry on both investment and commercial banking, this firm chose to discontinue its investment banking activities in favor of its more important commercial banking. Some of the personnel subsequently organized the independent Morgan, Stanley and Company, which is today one of the country's leading investment banks.

Similarly, the firm of Kuhn, Loeb and Company, with eleven partners and a net worth in 1931 of \$21 million, had long specialized in the financing of railroads. In 1933 it chose to give up its commercial banking business, but it is still one of the nation's largest investment banks. The firm of Dillon, Read and Company, organized as a joint stock association, was primarily an investment bank, although it received deposits until 1928. It remains one of the nation's largest investment banking companies.

The Banking Act of 1933 thus drew a sharp line of demarcation between commercial and investment banking on the theory that where the two were combined, each department would use the other to cover up its mistakes. For example, the investment bank would float a security issue to permit a weak corporation to repay a loan to the bank, or the commercial bank would buy "sour" bonds from the investment department or affiliate. Affiliations of any kind are now rigidly prohibited, and commercial banks are permitted to deal only in government securities.

Types of Investment Houses.—Investment banking, then, is a most diverse kind of business, ranging from the local dealer (who also acts as a broker) with a few thousand dollars of capital, to the large investment house of impregnable financial strength which yearly initiates, underwrites, and distributes securities running into hundreds of millions of dollars. The larger firms commonly engage in wholesale distribution, that is, they sell in large lots to other dealers and frequently initiate new issues through advice and negotiation with issuing corporations. These large firms usually sell some part of new issues at retail, but may be more interested in underwriting and wholesale distribution than in retail selling to individual investors or firms. Aside from these larger firms there are probably some 500 dealers large enough to act as occasional underwriters and over 1,000 smaller dealers who confine their activities to selling and do not act as underwriters. Today there are some 2,500 to 3,000 security-selling firms in the United States, of all sizes and descriptions.

Many of these investment firms specialize in particular securities. Some firms, known as bond houses, confine their interest exclusively to high-grade bonds. With their reputation for conservatism, they try to expand their sales to individual investors. who want safety above all else, and to banks, life insurance companies, trustees, and others, who are required by law to invest only in the safest securities. At the other extreme are numerous small houses that sell highly speculative common stocks. Such firms usually develop a technique for high-pressure selling to small and uncritical investors who all too frequently lose their money. Even if the project is not below the margin of honesty, the high commissions for selling such stocks leave inadequate capital to launch the enterprise and it collapses. So many small investors got their fingers burned in this manner that their numbers have shrunk considerably. But the most powerful deterrents to this type of distribution have been the Securities Act of 1933 and the state blue-sky laws under which the sale of fraudulent securities is severely penalized. Speculative securities can now be sold only with full disclosure of all relevant facts—an effective antidote to the distortions, half-truths, and downright fabrications that were frequently resorted to by the glib salesmen employed by these dubious firms.

Between these two extremes stand the hundreds of investment banks and security dealers. It should be made clear that the large houses do not always stress conservatism and the small houses do not always specialize in the riffraff. Many a small dealer attracts a clientele because securities that would be willingly sold by some large houses are never recommended by him to his conservative customers. Of course investment mistakes are inevitable. Foresight is never perfect. Changes in conditions and the passage of time play strange tricks with once-conservative investments, and probably no investment banker can point with pride to all of his progeny.

Some banks specialize in the securities of certain industries. One bank will underwrite and sell largely railroad securities; a second, utility securities; a third, securities of merchandising companies; a fourth, real estate securities; a fifth will specialize in government securities; and many others will look for business

wherever it may be found, in one industry or another, in new or old securities, in profits from buying and selling securities, or in brokerage commissions for executing customers' orders.

Functions of the Investment Bank.—It is not necessary to detail the organization and operations of the investment bank. Like any other forms of business, it is likely to succeed if there is a happy marriage of "brains and money," especially the former, for investment banks are not cold, impersonal merchants of securities that are sold like so many packages of breakfast food. They are more like personal service industries in which confidence in the judgment of the dealer is the most important factor. Financial strength may be more important to an investment banker than to a physician, but it will be of little use to either if clients lose confidence in their judgment. Except for the fly-bynight peddler of questionable stocks who hopes for one profitable sale, security selling is based on "repeat business." Hence the investment banker must act wisely, both toward the corporation he advises and the investor he advises and sells. Above all else. he must exercise good judgment in buying or underwriting securities, for his skill in that respect determines the quality of his merchandise. In this he may need the advice of engineers. accountants, lawyers, market analysts, economists, and others, either within or without his own research department, to provide basic information and make recommendations. But after all the evidence is weighed, he must make the final decision.

Sometimes he is in a superior position to know about the company, its background, and its prospective future by reason of his close association with the firm over a period of years. It is traditional for corporations to deal with one investment house for years, going to it for financial advice, issuing and selling securities through it, and having one of its members sit on the company's board of directors. This is, of course, to the mutual advantage of both the corporation and the investment house, provided that each is strong enough to repel attempts on the part of the other to do business on its own terms or to formulate policies designed for the sole benefit of itself. The healthiest condition exists where the corporation can turn elsewhere if it is

not satisfied with the terms offered by the house in question, and this is sometimes done. These continuing relationships are sometimes modified where corporations are required by law, as are railroads and some public utilities, to sell new securities by inviting competitive bids from any and all investment houses. Here the role of the banker as adviser is reduced greatly, if not destroyed, and the corporation must depend upon its own staff to make decisions concerning the kinds of security to issue, the prices to be charged, the rates of return, and other matters.

The investment bank must be in a position to guarantee the corporation that it will receive a given amount of money at a given time. This is the function of underwriting. The investment bank must bear the risks that the issue will not be sold in time or at an attractive price. When the bankers assume this risk it is common for them to call in other banks to share it. They therefore must maintain good relations and the confidence of other investment banks. Incidentally, when an investment bank brings out a new issue, it is expected to reciprocate by calling in banks which have previously shared issues with it. Such is the protocol of underwriting. To be successful, these temporary partnerships among firms, commonly called syndicates, must be based upon mutual confidence and a high sense of responsibility on the part of all members. No matter how much investment houses may compete in the sale of securities, this temporary union in a common interest requires that each cooperate in conformity with the syndicate agreement which places responsibilities on each firm for the benefit of all.

Finally, the large investment bank will have a selling department whose job it is to market the securities originated by its purchasing department or acquired by participation in syndicates formed by others, or to act merely as a retail dealer without syndicate participation. The task of selling is usually the determinant of the success of an issue. For this service a major part of the commission, or "spread," is paid, and most firms, except a few large originators and wholesalers, depend to a considerable extent upon income derived from selling commissions. This is particularly true of the smaller houses which receive little or no income from origination or underwriting fees. Selling depart-

ments are geared to distribute the securities through salesmen who have established contacts with individuals and institutional investors. As in other fields of merchandising, effective selling depends upon the "goods" to be sold, the ability of the salesmen, but most of all upon the reputation and record of the selling firm. In few lines of business activity is the relation between the firm, the salesman, and the customer based upon a greater measure of mutual confidence. The salesman is a counselor even more than a salesman, and he endeavors to attach customers on the firm's list as his permanent clients. His income depends upon his volume of sales, the great majority of which are to established clients. If he takes the long view he will sell to his customers only those securities that meet their particular needs, even though some types of securities, such as high-grade bonds, carry smaller selling commissions than lower-grade bonds, preferred stocks, and common stocks. The latter cannot be sold in large blocks to institutional investors but require more sales effort and are sold in small blocks to individuals. This is not to imply that security salesmen are paragons of virtue and intelligence. In fact, they too frequently fall short on both counts. But whereas in the 1920's the major qualifications of security salesmen were that they came from the right families, attended the right colleges, and had the brawn of a football hero or the social graces of a campus celebrity, the qualifications required today are higher. Security salesmanship, it is to be hoped, is acquiring a semiprofessional status where the best counselor is the best salesman. and where critical faculties are sufficiently vigorous to avoid the mass emotional delusions that so frequently distort perspective and balance. The notion that the salesman's only job is to sell promiscuously whatever his firm happens to underwrite or buy diminishes his stature and detracts from the responsibility he ought to assume.

Syndicates and Groups.—Since security underwriting and distribution commonly employ the services of more than one investment bank, a brief description of the nature and functions of the various groups is in order. Seldom does an investment bank "go it alone" in distributing a security, particularly if the issuer

is a well-known company. The reasons are obvious. The bank's capital is small in relation to its volume of business, and it cannot risk too much in one venture, nor does it want a major part of its capital tied up in one issue. Moreover, the bank is under a strong moral obligation to share an attractive issue with other bankers if it expects to share in issues they originate. Furthermore, the issue is likely to be placed in stronger hands, and it is likely to have a wider sale if it is sold to the customers of many firms rather than those of a single firm with a market limited to one or a few areas.

One group or a series of groups may be formed to bring out a new issue. These groups are formed on the initiative of the originating bank, or "house of original issue." Before 1933 it was common for the originating bank to enter into an agreement with corporations to purchase the entire issue. It would then form a purchase group, or purchase syndicate, through which it would shift the risk to others in proportion to their participations. Since 1933 the practice has been for the originating bank to organize a purchase syndicate to take over the issue directly from the corporation, and the originating house acts as manager and is usually paid a small commission on the entire issue for its services in advising the corporation, negotiating for the purchase, and organizing the purchase syndicate. Thus from the outset its liability is limited to its share or participation in the syndicate.

The next step in the distribution may be one of several alternatives. If the issue is small and can be easily disposed of, the members of the purchase syndicate may sell the entire issue to their own customers or enlist the aid of dealers who are permitted to buy the securities at the customary dealer's discount. On the other hand, if the issue is difficult to dispose of and is likely not to be sold at once, a banking, or carrying, syndicate may be organized to take over the liability from the purchase syndicate and to insure that cash will be advanced to the corporation as agreed. Liability is passed on by inviting more banks to enter into the underwriting, and the members of the purchase syndicate become members of the banking syndicate, but with reduced participations. If the issue is not sold in time, the syndicate will usually borrow money from commercial banks to advance to the

corporation, using the securities as collateral. This can be done for the syndicate by the manager of the originating house, or each underwriter may advance the amount of its participation and use the securities as collateral for a bank loan. Through the use of the banking syndicate an opportunity is given for more firms to participate in the underwriting, and the liability is spread fanwise to more and more banks. This also affords the stronger houses a chance to receive an extra commission.

Finally, with or without a banking or other intermediate syndicate, the selling effort is usually undertaken by the organization of a large number of investment firms and dealers, chosen for their ability to sell securities rather than for their financial impregnability, into a selling syndicate or a selling group. Again, the formation is undertaken by the originating house which acts as manager of the selling organization, as well as of all previously organized syndicates or groups. If the issue is large, firms from every part of the country may be asked to join in the selling effort. Dozens or scores may be invited. Until the middle 1920's the selling firms generally formed a selling syndicate, each firm undertaking the liability for the sale of a part of the issue. This commitment was known as its "participation." The result was that as soon as the selling syndicate was organized the liability was passed from the purchase (or banking) syndicate to it. If the issue failed to sell as anticipated, the members of the selling syndicate should take the loss. Actually, however, it was difficult to enforce liability upon a multitude of small firms, and the attempt to do so was seldom made. It became more and more obvious that these firms should act only as sellers, leaving the guaranteeing functions to the larger and stronger banks. Thus began the present fashion of distributing securities through selling groups rather than through syndicates.

Under a selling group arrangement, the originating firm makes contact with a multitude of selling firms, scattered over the country, which have cooperated in previous sales efforts. This may be done before the issue is brought out, so that the selling campaign is ready to start as soon as the purchase is consummated. Each house is "allotted" a certain amount of securities to sell but takes no participation, assumes no liability

in advance, and collects the selling commission on what it is able to dispose of. If the issue does not sell well, the unsold securities revert to the banking or purchase syndicate. If the selling syndicate form is used, the unsold securities revert to the participants of the selling syndicate, thus relieving the purchase and banking syndicates of further liability.

Syndicate Liability.—If the syndicate is "undivided" its participants have unlimited liability, that is, they must take their share of the unsold securities or syndicate losses regardless of the amount they have sold. This type of syndicate is sometimes used where a few large and financially strong banks unite to purchase or underwrite an issue. It is almost never used when a large and heterogeneous group of bankers and dealers are bound together in a selling effort. Sometimes a few large banks will get together to purchase, sell, or deal in securities under a "joint account." This invariably involves unlimited liability.

Firms having little contact with or knowledge of each other often cooperate to sell an issue under a "divided" or "limited liability" syndicate agreement. This agreement provides that each house is liable for the amount of its participation, but that the liability can be liquidated by disposing of or "drawing down" securities up to that amount. With the consent of the syndicate manager a house may sell more than its participation and receive the additional selling commission, but regardless of the sales success of other syndicate members, each house is liable only for its share or participation.

We have already taken up the third type of liability—or lack of it. In the selling group, every semblance of advance commitment is dropped, and a "no liability" arrangement results. Each bank, acting in good faith, in pursuit of selling commissions, will sell what it can up to the amount "allotted" to it by the manager. It need not bind itself in advance.

Other Syndicate Purposes and Selling Arrangements.—The usefulness of syndicates and groups is not limited to the distribution of newly issued securities of successful corporations. The services of the underwriting syndicate are most necessary when the financial future of a corporation hangs in the balance, and

only a successful distribution of new securities will save it. This is usually true when a corporation requires new capital to emerge from receivership or reorganization. Without the new capital, financial reconstruction is impossible, and no one is willing to invest new funds unless the program is assured of success. A syndicate provides this guaranty and so makes possible the financial rehabilitation which may be the first step on the road to complete recovery.

On some occasions a large block of outstanding securities may be marketed by the aid of a syndicate or group. A large individual holder of stock (usually a member of the management) or a trustee may wish to sell out or reduce his holdings of a stock. If the block is too large for the market to absorb without price-depressing effects, several devices might be used. It might be underwritten and sold like a new issue; or if the security is listed on the New York Stock Exchange, arrangements might be made through a member firm for a "special offering" or a "secondary distribution" of the stock.

Under the special offering the stock would be sold on the stock exchange at a fixed price with a special commission paid by the seller to buying brokers who solicit orders from their customers. Special offerings are permitted only when the amount of stock to be offered is so large that it could not effectively be sold on the exchange in the regular way. A secondary distribution is the sale outside the exchange of a block of listed stock. The stock is offered at a fixed price, usually its closing price on the exchange, and brokers and dealers are given a commission on each sale. Since the sale does not involve use of its facilities, consent of the exchange is not necessary, although members must receive permission to participate in a secondary distribution. Many sizable blocks of well-known listed stocks have been successfully distributed in this way. Thus the distribution can be easily effected without underwriting and without a drop in price, by providing the added incentive of a special selling commission to brokers and dealers.

The alternative method of distributing a large amount of outstanding securities is through the underwriting syndicate or the selling group. Here investment banks undertake the functions of guaranty and distribution, just as in the case of a new issue. In recent years syndicates have been widely used to distribute common stocks of electric power and gas operating companies that had to be sold by holding companies forced out of existence or into contraction by the simplification requirements of the "death sentence clause" (Section 11) of the Public Utility Holding Company Act of 1935. In liquidating these stocks by sale, the support of underwriters was essential since the blocks of stock owned were large and the regular market inadequate to absorb the offerings of many holding companies. An example of this was the sale of 710.500 shares of \$10 par value common stock of the Northern Natural Gas Company which had to be sold by North American Light and Power Company, the proceeds to be used to retire its own \$6 preferred stock. The issue was purchased under competitive bidding by a syndicate of thirty-one investment banks, headed by Dillon, Read and Company, which paid the holding company a price of \$25.80 (a competing syndicate headed by Blyth and Company had bid \$25.755) and offered it to the public at \$27 a share. This type of operation occurs almost daily as holding companies dispose of the stocks of some of their subsidiaries.

Pure Underwriting Syndicates.—So far our attention has been centered on arrangements for the actual purchase and sale of securities by investment banks. In this activity the banks perform two functions: they guarantee that the corporation will receive a given amount of money at a definite date, and they sell the securities. Sometimes these two functions are separated and the investment bank underwrites but does not sell, or sells but does not underwrite. The first has been a rather common practice for many years; the second function has developed since 1933.

The most common case in which investment banks underwrite but do not sell is in connection with the offering of new securities to existing stockholders, employees, or customers. Since offerings to stockholders are the most common they will be used to typify this sort of arrangement. Corporations frequently find that existing stockholders are the most likely buyers of new

security issues. Moreover, if the new securities are common stock, or preferred stock or bonds convertible into common stock, the law requires that the stockholders' pre-emptive right be recognized. But the corporation runs the risk that stockholders will not take the entire issue unless the sale is underwritten. Hence it is the usual practice to ask the investment bank to guarantee the sale to stockholders. To spread the risk, the bank organizes an underwriting syndicate, the participants of which share the liability. If the sale is successful, each receives its share of the underwriting commission and the syndicate dissolves. If the sale is unsuccessful, the members of the syndicate must take over the unsold portion and sell it individually or organize a new group or syndicate to dispose of it. Ordinarily the underwriting agreement provides that the commission on securities taken over by the syndicate will be larger than that received on the securities sold by the corporation to its stockholders.

This type of offering is frequent, particularly in times of buoyant stock prices, when "rights" to subscribe to new stock at less than market prices are looked upon as one of the valuable incidents of stock ownership. An example of this type of distribution on a large scale is seen in the offering by the Phillips Petroleum Company, in December, 1947, of 1 million shares of its stock to its stockholders at \$49 a share in the ratio of one new share for each five shares held. This was underwritten by the First Boston Corporation and its associated firms. Blyth and Company, Glore, Forgan and Company, Goldman, Sachs and Company, Hallgarten and Company, Harriman, Ripley and Company, Harris, Hall and Company, and Hemphill, Noves and Company. The offering was quite successful; only 24,010 shares were not taken up when subscription rights expired, and these the syndicate sold to the public at \$54.50 a share. The same year saw a gigantic financing program by the American Telephone and Telegraph Company, which on different occasions offered convertible bonds, totaling several hundred million dollars, to its stockholders. These offerings were underwritten by an imposing list of the strongest investment banks.

A new record was made early in 1948 when a syndicate of

206 banking houses underwrote the sale by Gulf Oil Company of 2,250,000 shares to raise about \$140 million. This underwriting was especially needed since the Mellon interests, which owned 54 per cent of the common stock, declined to subscribe to the new issue, making necessary the sale of half of the stock to the public and causing the Mellon interests to lose majority control

 The success of such offerings of stock under "privileged subscriptions" depends upon many conditions. If stockholders have confidence in the corporation and its management, if earnings and dividends have been regular and growing, if the general economic atmosphere is one of optimism concerning the future, if the expected use of the proceeds of the sale is likely to improve the company's earnings and dividends, if existing stock is widely held and the new issue is small in amount relative to the old so that its purchase will not burden existing holders or defeat investment diversification, and, finally, if the subscription price is lower than the going market price for the same stock, the issue is likely to be taken up by stockholders. If conditions are reversed, the offer will result in failure. Only when stock prices are high, business is prosperous, and the outlook is encouraging is it likely that stock financing through privileged subscriptions will be popular and widely practiced.

Value of Rights.—It is obvious that not all stockholders will buy the new stock to which they are entitled. Some stockholders do not have additional funds to invest when the offer is made. Some feel that they already have a large enough part of their investment fund in that particular basket and wish to diversify. Some may not be sanguine about future developments or may disapprove of additional expansion. But that does not mean that the issue will be a failure or that stockholders will lose their valuable privileges. This is because the stockholder who does not wish to exercise his privilege may sell it to another. "Rights" are bought and sold freely and sometimes quoted on stock exchanges during the period between their issuance and expiration.

The price of the right will vary with the relative number of

buyers and sellers and usually changes from day to day. It is commonly thought that rights tend to sell at higher prices soon after they are issued, and that they decline in price as expiration nears, because of the large number of stockholders who, through design or neglect, hold their rights until the last minute when they sell them and the market weakens. While there is some foundation for this conclusion in fact as well as in theory, it is not uniformly true. Much depends upon general market trends. In any case rights commonly sell somewhat below their theoretical value because it is easier to buy stock directly than to pay full value for the rights and then send the rights and a remittance covering the subscription price to the corporation or its transfer agent. Thus rights are attractive only if they can be procured at a slight discount. However, the discount cannot become too great because an arbitrage profit can then be made by buying the rights and selling the stock or bond short, where that is possible.

The theoretical value of a right can be easily computed by finding the difference between the market price and the subscription price, and dividing this difference by the number of shares it takes to subscribe to a new share, plus 1. Thus if Phillips Petroleum stock sold on the market for \$55, while the stockholders were permitted to subscribe one new share at \$49 for each five shares held, the theoretical value of the right would be

$$\frac{55-49}{5+1}=\frac{6}{6}=$$
\$1.

Since the new stock is sold at less than market value, some dilution in the claim of each share of stock takes place. The extent of the dilution of each old share (market) is exactly equal to the value of the right, and the theoretical market value of the stock after rights (ex-rights) is \$55 — \$1 or \$54. This can be seen by a simple example:

Value of 5 shares of old stock = 5 × \$55 = \$275 Add investment in 1 new share = 49 Theoretical value of 6 shares = \$324 Value of 1 share = \$ 54

It is thus evident that, other things remaining the same, the immediate effect of a privileged subscription is to reduce the

market price of the stock by the amount of the value of the right. Therefore the stockholder who does not exercise the right must sell it if he wishes to keep his investment intact. The easy transfer of rights permits the stockholder to protect his investment and makes it more likely that the offering will be successful. Of course, if the corporation continues to be profitable and its stock is viewed favorably by investors, the market price of the stock may recover to its former (pre-right) level or exceed it in a short time. Rights frequently give a stock some market glamour, since there is a common tendency for stockholders to consider rights as additional dividends—which they are not—rather than a return of capital. However, as long as the illusion persists that rights are similar to dividends, that they reflect profitable operations, and that they portend even larger dividends and more rights, their effect marketwise over longer periods may be exhilarating rather than depressing.

Employee and Customer Ownership.—Stock selling to employees and customers has sometimes taken on sizable proportions. Twenty years ago it was common for large corporations to offer their employees stock at advantageous prices on installment payment plans. The purpose was not only to inculcate habits of thrift but to give the employee a feeling that he had an interest and a share in the profitable operations of his concern. It was one phase of the new "industrial democracy" and in some cases there was envisaged ultimate ownership of the concern by its workers. Some corporations encouraged employee ownership by paying special dividends on employee-held stock. by contributing to the purchase of the stock, or by selling to employees treasury stock at a special discount from the market price. Many leading corporations inaugurated such plans, not so much to raise capital as to promote employee loyalty. It is probable that in the late 1920's several hundred such plans were in operation. Unfortunately, the drastic slump in stock prices following 1929 dealt a death blow to most of these plans, as many employees were obligated to pay for stock at prices far above the lower market prices. Disgruntlement rather than loyalty was the natural consequence, and most plans were scrapped. A study

by the Industrial Relations Section of Princeton University revealed that by 1936 only a fourth of the pre-1929 plans remained in operation, and most of these showed losses to employees. However, the plans of such companies as Procter and Gamble, American Telephone and Telegraph, and Standard Oil Company of New Jersey have met with real success.

The revised plan of American Telephone and Telegraph will serve to illustrate how a successful plan operates. Each employee may purchase one share of stock for each \$500 of annual pay. The employee pays \$5 per share per month and receives 2 per cent interest on his payment. When payments are completed he acquires a share at \$20 below the then prevailing market price of the stock, but in no case for less than \$100 or more than \$150 per share. In 1948 it was reported that 230,000 employees were taking advantage of this plan. In the average corporation however, it is unlikely that management will be quick to propose, or that its employees will accept, stock purchase plans in large numbers, either to raise capital or to promote industrial democracy until confidence in the future of stock prices is restored.

The sale of stock to customers without the intervention of the investment banker has also been of some importance, particularly among electric light and power companies. Sometimes an industrial corporation will attempt to sell stock to its customers to cement its dealer relationships and stimulate the sale of its products. Perhaps the outstanding example of this is the relationship between the United Drug Company and its Rexall stores owned by independent druggists. The advent of the chain grocery stores has forced independent grocers to become affiliated with wholesale houses which give advice on merchandising as well as supply goods. Sometimes the grocer buys shares in the wholesale company, thus helping to provide capital and giving him an interest in the wholesale end of the business. Of course this is somewhat analogous to the consumers' or producers' cooperative in which the patron owns shares but which are usually expected to show a benefit in patronage dividends rather than in dividends on the shares of stock.

The most widespread sales of stock to customers took place

in the electric light and power field during the decade of the 1920's. The purposes were to insure a steady flow of capital because of rapid growth, to secure customer good will, and to discourage stringent regulation and public ownership. In addition there were the by-products of sounder capital structures through equity rather than bond financing, and better-satisfied employees, who acted as security salesmen in their spare time and received substantial commissions for their efforts. Preferred stocks yielding from 5 to 7 per cent, rather than common stocks or bonds, were usually sold. Sometimes this was the safe and sound preferred stock of a conservatively capitalized operating company, but more often it was the speculative preferred stock of a holding company, sold as a sound investment to an uninformed customer-investor by an equally uninformed employee-salesman. Despite this it is probable that losses were no greater on this type of investment than in some alternative forms that would have been employed in that period.

The preferred stocks of operating companies in this depression-resistant industry were fairly good investments, but the deep depression of 1932 took its toll in reduced dividends. The inevitable result was distrust rather than loyalty, especially after the sharp criticism of the industry by the Federal Trade Commission. With a new post-World War II era of expansion of physical plant there is no evidence that customer ownership in the electric power industry will ever again be an important source of new capital. Holding companies and their subsidiaries are subject to the act of 1935, which forbids the issuance of a new preferred stock, except by special permission of the Securities and Exchange Commission, and makes it unlawful for parent and subsidiary companies to offer holding company securities from house to house, or to have their employees engage in the sale of holding company securities.

Security Distribution Since 1933.—The security losses in the Great Depression, the uncertain state of the security markets, the Securities Act of 1933, requiring an interval of twenty days after the filing of a registration statement before a new security issue can be sold, and the liabilities imposed by that law upon

corporation officers, directors, and underwriters—all these combined to confront the investment banker with new and unknown hazards. At first the risks loomed so large that bankers were reluctant to undertake firm underwriting commitments. Instead they took some issues on a "best effort" basis or else inserted a "market out" clause in the underwriting contract. In either case there was no unconditional guaranty to the corporation, and underwriting in the accepted sense of the term was absent. The "best effort" agreement is not really an underwriting commitment at all, since the bankers simply agree to act as sales agents for the corporation. For this they receive a sales commission, but the corporation bears the risk until the issue is sold. Underwriting agreements with "market out" clauses commit the bankers to purchase the issue unless some unforeseen development of importance changes market (or other) conditions. the absence of the specified changes the risk is borne by the bankers, and the term "underwriting" more accurately applies. However, if the escape clauses are sufficiently broad and vague, the banker can probably find a pretext to disavow liability for an issue that sells badly; here the underwriting becomes only partial. at best. A spectacular termination of an underwriting agreement occurred early in 1948, when the sale of 900,000 shares of common stock of Kaiser-Frazer Corporation was called off by Otis and Company and First California Company, the two principal underwriters. Market weakness in the stock at the time of offering threatened large losses to the underwriters, who disclaimed liability because of legal proceedings that were started against the company at the last minute by a former counsel of Otis and Company, presumably acting independently. Kaiser-Frazer brought suit for damages; and the Securities and Exchange Commission and the National Association of Security Dealers undertook lengthy investigations of this rather exceptional episode.

As might be assumed, the weaker issues and those of small, less well-known corporations are the hardest to sell and therefore are unlikely to receive firm commitments. The issues that need a firm underwriting most are least likely to get it. In an able study of new corporate issues brought out between 1933 and

1938, Haven ¹ found that 93 per cent of the bonds were underwritten on a firm commitment basis, while only 74 per cent of the preferred stock issues and 76 per cent of the common stock issues were sold under firm commitments. This study did show that the overwhelming majority of new issues are those in which the bankers assume the risk that the sale might be unsuccessful.

Direct Placement.—Another development since 1933 has been the direct sale of securities by a corporation to one or more large investing institutions, usually insurance companies or banks. Here the corporation may dispense entirely with the services of the investment banker, or it may consult the banker for advice and pay it a small commission—usually about one-fourth of 1 per cent of the amount—for placing the issue. The bank simply acts as an agent in arranging the sale; it assumes no risk and incurs only those expenses that are incidental to its advice and sales negotiations. Many issues are privately placed without the aid of the banker. Since the institutional investors will buy only the higher-grade investments, most of the direct placements have been of high-grade bonds. Two broad objectives are accomplished. First, the cost of flotation is reduced by saving the bankers' commissions (or most of them) and by avoiding the costs of complying with the registration requirements of the Securities Act of 1933 and state blue-sky laws. Secondly, the liabilities under the Securities Act (discussed on pages 215-227) in the early years loomed large and ominous to some corporate managements. These could be avoided by a direct private sale, which removed the issues from the registration requirements of the law. In addition, the market risks imposed by the twentyday waiting period requirement could be avoided and the bonds sold immediately.

Against these advantages there are some drawbacks. Close contact with the banker may be jeopardized and the benefit of his counsel lost. Opportunities to repurchase securities at a discount, sometimes available to corporations whose securities are widely distributed and actively traded in, are absent when one

¹ T. Kenneth Haven, Investment Banking Under the Securities and Exchange Commission (Ann Arbor: University of Michigan, 1940), p. 131.

investor holds the entire issue. Another disadvantage frequently stressed by the critics of direct placement is that institutional investors with expert investment officers are likely to be hard bargainers who will not pay more for an issue than would an investment banker: therefore the corporation does not get a higher price for its securities than it otherwise would, and the insurance companies get the equivalent of the underwriting commission. This contention is difficult to prove or disprove statistically, but the persistence of a stream of direct placements over the years would seem to indicate that corporate managements feel that they can get a better deal directly than through public flotation. Some of them broke away from well-established banker connections to sell directly. Finally, it is contended that direct placement denies to the issuing corporation the good will that accrues to it when its securities are widely held. Here, again, measurement is difficult. Security ownership may or may not stimulate public sentiment favorable to the corporation and its products. Ordinarily it should have some favorable effect, but it is doubtful if the value would be large enough to overcome the advantages of direct placement of some issues. This is particularly true when bonds, the only kind of issues that can be sold privately, are concerned. Widespread stock ownership, however, may stimulate a company's sales by giving many customers an interest in promoting its sales. It is even more important in the offering of future issues of stock through privileged subscriptions. But since institutional investors do not usually buy common stocks, direct placement is not a problem where equity financing takes place.

Direct placement of new bond issues has been prevalent since 1933 and seems to have grown in importance. In 1936 about 10 per cent of all new bonds were privately placed. During the next ten years from one-fourth to one-third of the new bonds were sold privately. This proportion seems to prevail at the present time.

Since some of the strongest issues are privately placed, it is obvious that small banks and individual investors are deprived of access to them. For this reason private placement has been criticized on social grounds. In so far as this trend has been

stimulated by government regulation of new issues, it is somewhat ironic that legislation designed to protect the small and helpless investor should have resulted in a partial drying up of the supply of securities best suited to his needs. However, it must not be assumed that the only incentive to direct placement is the desire to avoid compliance with the Security Acts. Sometimes a corporation voluntarily registers new bonds under the law though it contemplates a private sale. This avoids the necessity of doing so at a later date if any of the bonds are to be offered to the public.

Underwriting and Selling Charges.—The cost to the corporation of the investment banker's services varies from time to time and from issue to issue. If the banker merely underwrites an issue of stock that is offered, on attractive terms, to its own stockholders, and complete placement is likely, the commission is likely to be low—perhaps 1 to 3 per cent—with an additional commission of from 2 to 5 per cent on stock not taken by stockholders. The former is a pure underwriting premium, the second a commission to cover the cost of disposing of the stock.

If, instead of underwriting under such a stand-by arrangement, the bankers actually purchase the issue and offer it for sale, commissions large enough to cover the cost of marketing the issue must be received. If the issue is of a very high grade, suitable for conservative institutional investment, and subject to sale in large blocks, the spread will be small. Contrariwise, if the issue is risky, small in amount, unseasoned marketwise, and likely to require considerable sales effort, the spread will be large. The Securities and Exchange Commission found that for the period 1945-1947 underwriting commissions for all securities publicly offered averaged 0.8 per cent for bonds, 3.4 per cent for preferred stocks, and 8.8 per cent for common stocks. These are low compared with commissions in preceding years. For example, in 1939 the figure was 2.0 per cent for bonds, 6.4 per cent for preferred stocks, and 16.9 per cent for common stocks; while the 1934 to 1937 averages were 2.24 per cent for bonds, 3.58 per cent for preferred stocks, and 14.4 per cent for common stocks.

Comparable data for the 1920's or earlier are not available, but commissions on highest grade railroad bonds issued from 1926-29 were about 3 per cent. Prior to World War I, bankers' commissions of about 5 per cent for high-grade bonds and 10 per cent for preferred stocks were considered typical. Thus it appears that bankers' tommissions are considerably less than they were thirty-five years ago. However, these are over-all figures and unless the securities were the same in quality, size of issue, market seasoning, and in other respects, the comparison is only indicative, not conclusive.

A somewhat better comparison is to be found in a Securities and Exchange Commission study of the cost of floating small issues of bonds and preferred stocks in the period 1925-29 as compared with 1935-38.2 For the earlier period the average cost of selling bond issues of less than \$5 million was 6.0 per cent, of which bankers' commissions were 5.2 per cent and other costs 0.8 per cent; in the later period the average cost was 4.8 per cent, of which bankers' commissions were 3.4 per cent and other costs 1.4 per cent. For preferred stock issues the average cost was 7.8 per cent (commissions 7.1 per cent, other costs 0.7 per cent) in the years 1925-29, as compared with 10.2 per cent (commissions 8.9 per cent, other costs 1.3 per cent) in 1935-38. Here are conflicting tendencies. The lower cost of bond flotation is apparent, as is the higher cost of selling small issues of preferred stocks. The increase in other costs, due to the requirements of the Securities Act of 1933, is also apparent. The most notable reduction in the cost of bankers' services has come in the distribution of high-grade bonds, particularly large issues. It is still costly to sell speculative bonds, preferred stocks, and common stocks, especially when issued in small amounts. In the 1945-47 period, bankers' commissions on issues of \$2 million or less were about 4 per cent for bonds, 8 per cent for preferred stock, and 15 per cent for common stock.

It must be emphasized that bankers' commissions are not profits, as is frequently and erroneously assumed. A profit is received only if the costs and losses of underwriting and mer-

² Securities and Exchange Commission, Statistical Series, Release No. 418, May, 1940.

chandising securities can be kept down. The most costly operation is the actual sale of the securities. Thus when many syndicates are organized the security is passed along at small markups so as to leave the bulk of the spread as commission for selling. In the usual high-grade bond issue with a spread of 2 points it is likely that about 1 to 1¼ points will be allowed as commission for selling, leaving ½ point to members of the underwriting syndicate and perhaps ¼ point to the originating house. As the spread increases in amount, the proportion allowed for selling is increased, and the commissions for originating and underwriting remain more stable, but not fixed.

Bankers' Profits.—In some underwritings the banker takes part of his compensation in the form of an option to buy common stock of the issuing corporation at a definite price within a stated time. Thus, if the company is successful and the options prove valuable, a large profit may be made out of the underwriting. In times of rising stock prices such options are valuable and in the past have been frequently obtained. Ordinarily they are granted only when common stock is sold, although occasionally they are a feature of bond or preferred stock issues. They are more likely to arise in the promotion of new enterprises where the company needs to conserve cash and cannot afford to pay a cash commission large enough to attract the banker's services. No doubt, options are a legitimate type of reward, but since they are always given in addition to a cash commission they may be excessive in view of the services rendered. Of course many of them turn out to be worthless because the stock doesn't rise in price, but occasionally they are profitable at the start since the option price is less than the current market price. On the whole, it would seem that they are most necessary and justified in new promotions and least so when an ample cash commission is already allowed. The Senate Committee on Banking and Currency in 1934 reported a few notorious instances of the misuse of bankers' options during the 1920's, and although these were probably exceptions rather than the rule, their disclosure hastened reform legislation in banking and security issuance. Options were not made illegal, but full facts concerning them must be clearly explained to prospective purchasers of securities.

Besides the cost of operating an investment bank, there are the inevitable losses that cannot be escaped. Usually these are not advertised, and so it is easy to get the impression that bankers' fees—particularly for pure underwriting—are all profit. Actually large losses are sometimes taken, and the loss on one "sour" issue may more than offset the net profits on many successful issues. If the issue succeeds, a commission of a few points, at best, is received. If the issue fails to move, it may be offered at a loss, with repeated markdowns until it is disposed of; or the bank, hoping that the market will improve, may hold the issue at the risk of still further losses. Since investment banks do not advertise their mistakes, only those close to an issue are likely to know whether it has failed and the amount of the loss. The financial press usually reports in general terms on the success of new issues, but there are no comprehensive data on profits and losses. Studies have shown that about 20 per cent of the new issues offered in the 1930's were not successful. Some of these involved very large losses to their underwriters.

The net profits earned by investment banks are commonly thought to be large. However, there is little to support that impression. Like other forms of business, profitability is determined by the price of the service, its costs, its losses, and most important of all, its volume. Many costs are relatively fixed and if the volume of new issues shrinks as it did during the depressed 1930's, investment houses operate at a loss. Haven a found that five investment banking firms earned on the average only 8 per cent a year on their invested capital in the period 1935-39. Three of the five earned 6 per cent or less. Every bank suffered at least one year of deficit operations out of the five years. In all, earnings fluctuated widely from year to year. In years of falling security prices, large losses are almost inevitable since losses on securities held more than offset any operating earnings that might have been realized.

⁸ Haven, op. cit., p. 136.

Competitive Bidding for New Securities.—In a few areas it has become customary for investment banks to buy new issues of securities by submitting sealed bids rather than by negotiations with management. For years this has been the practice in the distribution of the securities of states and municipalities. In a few states, notably Massachusetts, public utilities have long been required to offer new securities by this method.

Equipment trust issues of railroads have been sold competitively since 1926, and in May, 1944, the Interstate Commerce Commission, after a long investigation and heated controversy, required that all new railroad issues be sold under competitive bidding. From this rule it exempted common and preferred stock issues, securities offered to existing security holders, notes of less than three years' maturity, issues of less than \$1 million, securities issued for railroad property, and issues specifically exempted by the commission. The I.C.C. found that charges of monopoly, banker domination, and the absence of arm's-length bargaining between the railroads and bankers in new security issues were without foundation, but that many railroads habitually sold new issues through one or the other of the two large houses long identified with railroad finance—Kuhn, Loeb and Company and Morgan, Stanley and Company-and were reluctant to go to other bankers. Competitive bidding was seen as a cure for the possibility of excessive charges for the bankers' services. The decision was a victory for a few large midwestern banks, particularly Halsey, Stuart and Company of Chicago and Otis and Company of Cleveland, which had for many years cast covetous eyes at railroad financing, long handled by eastern bankers. In fact, much of the drive for competitive bidding came from the minority of the investment bankers who thought they could gain more than they would lose by it, and one commissioner dissented from the majority decision partly because he saw it as a private fight among bankers rather than an issue of public policy.

Another long controversy over competitive bidding for new securities centered in the public utility field. Under the Public Utility Holding Company Act of 1935, the issuance of new securities of holding companies, their subsidiaries, and affiliates

in the electric and the gas industry was made subject to the control of the Securities and Exchange Commission, which has been diligent in its scrutiny of utility-banker relationships. Although the law gives it no specific authority to require that new security issues be sold in any particular way, it does give the commission broad powers over new utility issues and specifically provides that new issues might be disapproved if "fees, commissions, or other remuneration" are not reasonable.

At the outset the S.E.C. promoted but did not require competitive bidding. Instead, in March 1939, it adopted Rule U-12F-2, which in effect prohibited a banker from collecting commissions on the sale of an issue (except for a minor participation, not exceeding 5 per cent of the offering) if it had not been obtained by competitive bidding or by negotiations at arm's length between banker and corporation. The rule was designed to break up long-standing relationships without specifically imposing competitive bidding, although the relationship could continue if the fees were foregone. This was not considered a satisfactory or permanent solution, and the Public Utility Division of the S.E.C., after a special study, recommended that competitive bidding be required on all future issues.

After considering the report and hearing opposition from the Investment Bankers Association, many investment banks, and some institutional investors, the Securities and Exchange Commission, under Rule U-50, imposed the competitive bidding requirement as of May 7, 1941. Under it, new or outstanding utility issues, whether privately placed or publicly offered, must be sold competitively, although it does not compel the utility to accept the highest (or any other) bid. Certain transactions are exempted, such as offerings of securities to existing stockholders or issues distributed in reorganization or liquidation (if not underwritten), loans from banks or similar institutions of less than ten years' duration if no fees are paid for placement, securities acquired by holding companies to promote efficient integration of properties, issues of less than \$1 million, and offerings that the S.E.C. may specifically exempt. It is note-

⁴ Securities and Exchange Commission Holding Company Act, Release No. 2676, April 8, 1941.

worthy that stock issues, as well as bond issues, come under the rule.

Arguments For and Against Competitive Bidding.—Although no extended discussion of the pros and cons of competitive bidding is possible here, a short summary of the opposing viewpoints is desirable. The arguments in favor center around two ideas. The first is that only by competitive bidding can the proper price of the security be determined and the proper banker's commission set. Presumably this protects the issuing corporation. The second is that it will eliminate undue concentration in security underwriting and remove cases of bank domination of utility corporations. It has also been argued, with little proof, that it would stimulate equity financing over bond financing.

Against competitive bidding are the arguments that corporations are free to sell issues competitively any time they wish, that banker domination is more a myth than a reality, and that bankers have to deal fairly and efficiently or the corporation will go elsewhere, as witness the prevalence of private placement of securities and the numerous instances where corporations have switched bankers. (Morgan, Stanley and Company in arguing against competitive bidding cited such switches by Bethlehem Steel, Panhandle Eastern Pipe Line, Crucible Steel, Republic Steel, Tidewater Oil, Consolidated Oil, and Chesapeake and Ohio Railroad. The bank denied that it dominated a single corporation and defied the S.E.C. to prove that it did.) It has also been argued that investment banking is not unduly concentrated, that thousands of firms participate in underwriting and distribution, and that there is as much concentration in competitive underwriting as in negotiated underwriting.

Moreover, it is argued, the interests of the investor are likely to be neglected under competitive bidding, first, by a tendency to push up prices to the investor, and second, by eliminating protective features in bond and stock contracts that would be required by a negotiating banker. A banker who merely bids for an issue will find the terms already fixed by the corporation.

The corporation loses the advantages that are presumed to flow from the constant contact with an investment bank that has been close to its affairs, such as counsel and guidance and a feeling of responsibility that may be of great help in time of need. These services are valuable but unrecognized in competitive bidding.

It is not easy to resolve these conflicting points of view. There is much to be said for both positions. The fact seems to be that where competitive bidding is possible it has worked reasonably well. It is particularly likely to succeed where issues are of very high quality, well known, standardized, and can be sold in large amounts. Here underwriting spreads have been very low because costs of distribution are small. Prior to 1941 most of the issues sold competitively did not have to be registered under the Securities Act of 1933 (i.e., state and municipal bonds and railroad equipment securities) but registration requirements do not seem to have interfered unduly with the competitive placement of new utility issues since then.

Exemptions from Competitive Bidding.—A brief look at competitive bidding in the utility industry since 1941 may be instructive, even though the discussion must be selective rather than exhaustive. In general the Securities and Exchange Commission adheres to its rules requiring competitive bids for the sale of new or portfolio securities, but it grants exemptions when, in its opinion, conditions require it. Exchanges of stock, when underwritten, are also required to follow the competitive rule, presumably so that proper prices and commissions can be determined. Generally speaking, competitive bidding has worked better for bond issues than for stock issues, even where the same company is concerned. Thus on December 7, 1947, the Central Maine Power Company sold \$4 million of 3½ per cent bonds competitively to a syndicate at a two-point premium over par. However, at the same time it received only one bid of \$13.75 a share for its common stock, less an underwriting commission of \$1.75 a share, when the stock was quoted on the market at \$16.75. The company rejected the bid, and certainly found little encouragement to equity financing. Sometimes only one bid is received, even on a bond issue, as when the Alabama Power Company sold an 80 million issue of 3½ per cent first mortgage bonds to a syndicate of eighty-one investment banking firms at 100.4, the sole bidder for the issue. Sometimes competitive bids are below the price a corporation could receive by negotiation, and the commission usually grants an exception in favor of the higher offer. Thus the Central Vermont Public Service Corporation, after rejecting a competitive bid of a twenty-eight-house syndicate at \$13.25 a share, was permitted to sell its common stock to an investment firm at \$14.92 a share, the stock to be resold to the public at \$16 a share.

Exemptions from competitive bidding have also been granted by the commission where substantial risks attended a stand-by underwriting of preferred stock first offered to existing stockholders, or when it was unlikely that bids would be forthcoming for preferred stock in a declining market. On the other hand, the commission has held that previous unsuccessful experience with competitive bidding is no reason for exemption from the requirements.

Where securities are likely to require unusual sales efforts, exemptions are sometimes granted. For example, Electric Power and Light Corporation was permitted to negotiate for the sale of the "unseasoned" stock of the Idaho Power Company which could be sold only after a campaign of education of prospective investors was undertaken. Similarly, Cities Service Power and Light Company was permitted to negotiate the sale of a large issue of stock of the Public Service Company of Colorado, which had no established market. Even a small bond issue of a reorganized industrial subsidiary of a utility company that was likely to have only a local market was exempted, as was the sale of bonds of a bankrupt company to an insurance company where no fees were paid.

Sometimes the commission has permitted a negotiated placement after once having denied exemption from its competitive bidding rule. Thus the Northern Indiana Public Service Company was ordered against its will to submit to competitive bidding an exchange offer of preferred stock to its stockholders. Only one syndicate, consisting of sixty-five houses, submitted a bid, which the company found unsatisfactory. Three months later, the commission permitted the company to negotiate for an

underwriting of the exchange by a syndicate headed by another investment house.

It has also exempted issues of common and preferred stock of subsidiaries, the proceeds of which are used solely to finance the subsidiary, if a state commission has given its approval. Moreover, small issues, even though in excess of \$1 million, are sometimes exempted. Exemption is especially likely if the issuer has diligently "shopped around" in search of the best deal.

This enumeration of departures from competitive bidding indicates that the rule has been applied with a certain measure of realism, although the S.E.C. is reluctant to depart from it. It may even go so far as to see that bids submitted are the result of real competition and not prearranged negotiations in disguise. Its experience does not support the claim that competitive bidding is a cure-all or that it is necessarily the best or cheapest way of distributing securities. Common and preferred stock sales, particularly if the issue is unseasoned, seem to account for many exceptions and raise doubts that competitive bidding is always the best way to raise equity capital. Bankers may bid on bonds but refuse to bid on preferred or common stock of the same company. A recent example of this occurred when the Central Power and Light Company placed an issue of bonds by competitive bidding, but failed to receive a single bid on a proposed issue of 5 per cent preferred stock. It later negotiated for the sale of the stock, but the S.E.C. found the underwriting fee of five dollars a share to be excessive and denied exemption from competitive bidding. In this case the commission went further, suggesting that Central raise the funds by selling common stock to its parent, Central and South West Corporation, which in turn could raise the money by offering its common stock to its stockholders and the investing public.⁵ This dependence upon the holding company for additional capital is typical of presentday electric utility financing.

On the other hand, the early fears of bankers that competitive bidding would starve them to death are also without foundation. Whether competitive bidding is responsible for smaller under-

⁵ Securities and Exchange Commission Holding Company Act of 1935, Release No. 837.5, July 27, 1948.

writing spreads in bonds cannot be proved or disproved. It is possible to show that negotiated sales sometimes involve a smaller spread than competitive sales, and vice versa. Competitive bidding has probably reduced spreads on high-grade issues, but it is doubtful if it has had the same effect on the sale of more risky securities.

It will be interesting to see whether the practice of competitive bidding will spread to the large mass of unregulated industries, where it is now almost unknown. An exception to this was the competitive sale of debenture bonds and preferred stock by a wholesale drug corporation, McKesson and Robbins, Inc., which came under the jurisdiction of a bankruptcy court as the result of speculation and gross mismanagement by its former president. The court ordered that the securities be sold competitively.

REFERENCES FOR FURTHER READING

- Burtchett, F. F. Corporation Finance. (New York: Harper & Bros., 1934), Chs. 21-25.
- Cherrington, H. V. Business Organization and Finance. New York: The Ronald Press Co., 1948), Ch. 9.
- Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book IV, Chs. 8, 9.
- Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Chs. 14, 15.
- Hoagland, H. E. Corporation Finance, 3rd ed. (New York: McGraw-Hill Book Co., Inc., 1947), Chs. 20-22.
- Lincoln, E. E. Applied Business Finance, 5th ed. (New York: McGraw-Hill Book Co., Inc., 1941), Chs. 10, 12.
- Lyon, Hastings. Corporations and Their Financing. (Boston: D. C. Heath & Co., 1938), Chs. 26-35.
- Stock Exchange Practices. Hearings Before Subcommittee of the Committee on Banking and Currency, U. S. Senate, 72nd and 73rd Cong., 1932-34.
- Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century Co., Inc., 1942), Chs. 28, 29.
- Twentieth Century Fund, Inc. The Security Markets. (New York: The Fund, 1935).
- Willis, H. P., and Bogen, J. I. Investment Banking. (New York: Harper & Bros., 1929).

Chapter 11

THE REGULATION OF SECURITIES AND FINANCE

Need for Protection of Investors.—The description of the sale of securities would not be complete without some mention of special measures taken by government to protect the buyer of securities. The process has been a gradual one, culminating in federal legislation, particularly the Securities Act of 1933 and the Securities Exchange Act of 1934.

Although the doctrine of caveat emptor (let the buyer beware) has been the general rule governing the relationships between buyers and sellers, its inadequacy in security sales has long been apparent. The doctrine rests upon the presumption that the buyer and the seller are equally well informed and can trade on an evenhanded basis, and that if this condition does not exist they ought, in self-interest, to refrain from bargaining. This presumption, however, does not apply to security transactions in which the general public are the buyers. There was a time when the average investor found an outlet for his savings in local property or securities about which he had a reasonable amount of knowledge. He was capable of appraising a farm or a residence and could lend on mortgage security with informed competence. This is still true, but in the past half century investment horizons have widened to include the securities of corporations and governments in which a growing proportion of the public has invested. The origins go back a century or more. Stocks and bonds of privately financed local improvement projects-at first canals and highways, later railroads-were sold under the spur of civic duty, local pride, and promised prosperity.

Wide security distribution was stimulated by the Civil War when the first large selling syndicates, under the direction of Jay Cooke and Company, undertook to sell the bonds of the United States government to every individual and institution that could be reached by the far-flung and united sales efforts of investment firms and dealers, organized on an unprecedented scale. With the end of the war came new issues of railroad securities, followed by those of some of the large industrial combinations and the new public utilities that were emerging in a nation becoming more and more urbanized and losing its predominantly agricultural character. Finally, World War I, with its Liberty Loan campaigns, made millions of Americans "security conscious."

These developments opened the way to the unscrupulous dealer and the "sharper," who hatched up new corporate projects with the primary purpose of separating the gullible investor from his money. The art of high-pressure selling from door to door developed rapidly, and appeals to buyers ran the whole gamut of human emotions from avarice and pride to hatred of Wall Street and love for the common man. The buyer, unless fortified by a healthy natural skepticism, was frequently unequal to this glib but convincing talk, and the stakes were all too frequently part or all of his life's savings, accumulated by years of labor and privation.

Of course the victim had certain elementary protections under the law. Sale, with intent to defraud or under false representation, had long been unlawful under the common and statutory law, but the remedy was too slow and uncertain to be of much avail. Seldom did the buyer realize that he had been "robbed" until months or even years had passed. Sometimes the peddler of fraudulent securities would deliberately pay dividends out of sales proceeds for a time, to keep the victim satisfied or to get him to "invest" in another scheme later on. By the time the buyer recognized his plight, he was unable to locate the swindler, who was as fleet of foot as glib of tongue and who probably had long since sought greener pastures. Even if he could be caught, it was difficult and costly to bring a successful court action for recovery against him. The right to recover under the law was based upon proof of false representation or intent to deceive or defraud, not mere incompetence or loss of money, and the burden of proof was on the victim. Because of the expense of such legal

proceedings and the likelihood that the culprit would be without money to pay a judgment, if obtained, the chance of recovery was so slim as to discourage legal action.

Postal Fraud Law.—As it became clear that the right of private suit was ineffective in dealing with the problem of fraudulent security sales, remedial steps were taken by the government. The first was the Postal Fraud Law of 1909, under which the fraudulent sale of goods, services, or securities by the use of the mails was made a federal offense, punishable by fine and imprisonment. In addition, the Postmaster General was empowered to issue stop orders to prevent the use of postal facilities by those who sent misleading statements through the mails. A sizable corps of postal inspectors was assigned to the task of detecting suspicious advertising or communications, but complete coverage was difficult. If their suspicions were justified, they could forbid the person or firm the use of the mails, and if they found that fraud had been committed, the case was referred to a federal district attorney for criminal action. Many security swindlers, some of them attracting nation-wide attention, were prosecuted under this law. But the law was not a complete solution to the problem. It was of no effect if the mails had not been used as part of the scheme. And even if the purveyor of fake mining or oil-well stocks found himself faced with an order stopping his use of the mails, he was only slightly inconvenienced. It was always possible to find a new name and address, and continue as usual. Prosecution under criminal indictment was more serious and frequently effective, but all too often it was a case of locking the barn door after the horse had been stolen. Punishing the criminal did not restore the money to the victim. Moreover, the job was too stupendous to be done by the relatively small staff of the Post Office Department, whose primary function was to provide mail service, not to regulate its millions of users.

State Blue-Sky Laws.—In 1911 the states began to enact legislation that was preventive as well as punitive in nature. These laws, designed to halt the sales of securities based on nothing more than promises and pieces of the "blue sky," are of

two general classes: registration laws and antifraud laws. Under most registration laws, which are modeled after the Kansas statute of 1911 and which are more numerous than antifraud laws, no one may sell securities within a state unless he is registered and receives a license, which is granted only after an investigation of the integrity, reputation, and reliability of the applicant. Should one engage in questionable practices, his license may be canceled and he can no longer operate. Many states impose the additional requirement that dealers register separately each new issue they wish to sell. This is done by furnishing to the proper state authorities, usually the Securities Commission, a written statement outlining all pertinent facts concerning the security to be sold. If the commission is satisfied that the issue is not fraudulently conceived or represented, the security may be sold, even though it may be highly speculative. It is important to note that the commission does not consider the investment merits of the security. While many issues do turn out badly for investors because they are based upon inherently speculative ventures, the function of the commission is not to sift the good investments from the poor, but only the fraudulent from the legitimate. These laws have met with varying degrees of success. Enforcement standards have varied considerably from state to state. To simplify administration, many states exempt issues of public utilities, building and loan associations, corporations in the process of reorganization, and wellestablished corporations. The swindler sometimes uses one of these exempted areas to evade the law.

The laws at first met with much litigation and their constitutionality was attacked, but in 1917 the United States Supreme Court, in Hall v. Geiger-Jones Co., 242 U.S. 539, upheld the Ohio law as a legitimate exercise of the power of the state to protect its citizens. As time went on and the original zeal disappeared, some state commissions became more and more lax. Political lameducks were all too frequently appointed commissioners. At best, they were incompetent; at worst, corruptible. But in general the advent of these laws witnessed a sharp decline in the number of security dealers and of new issues. This indi-

cated that the laws were probably effective in eliminating at least part of the criminal fringe in the intrastate sales of securities.

In the few states which have antifraud laws rather than registration laws, the results have varied with the vigor of enforcement. New York, whose Martin Law, passed in 1921, is a model of this type, has achieved a fair measure of success. It attempts to deter fraud by immediate state prosecution of anyone selling securities with intent to defraud. Constant surveillance has been made easier by an amendment to the law in 1925, under which each dealer must publish an official notice of entrance into business, and each new issue of securities offered must be announced in an official paper. The attorney general may then investigate and enjoin the sale of fraudulent issues as well as track down and punish security swindlers. While this type of law is less effective in completely preventing the sale of fraudulent securities, its success through immediate and forceful prosecution may be as great as that of the stronger registration laws with weak enforcement. Furthermore, it has the formal advantage over registration laws in that it places fewer impediments and less expense in the way of selling legitimate issues, since no official must pass upon the security before it is offered for sale.

All state security laws suffered from one severe drawback in providing investor protection. They were helpless against sales of securities across state lines, since it was impossible for the law to reach outside the state and punish violators. Moreover, although they were somewhat effective against downright fraud, they were short on the positive requirement that the investor be supplied with complete and reliable information so that he could weigh the risks of new issues. Too frequently the information contained in the advertising and in the prospectus under which the issue was offered was partial. Good points were played up; bad ones were omitted or relegated to fine print at the bottom of the page; and disclaiming responsibility for the accuracy of the information was the standard practice.

Need for Federal Regulation.—After World War I, the need for federal regulation was recognized by the Capital Issues Committee, and separate bills were introduced by Congressmen

Taylor, Volstead, and Davison. None of these bills became law. With the stock-market crash in 1929, the deep depression that followed, and the melting away of security values, a new interest in security regulation was aroused; and one of the early steps of the newly elected New Deal government was to enact drastic federal controls over new security issues through the Securities Act of 1933, and over the purchase and sale of old securities through the Securities Exchange Act of 1934.

The deficiencies of the financial community were placed in the spotlight in hearings before the Senate Committee on Banking and Currency. Although the investigation was neither wholly objective nor broad, it disclosed instances in which respected investment banks either had lost their critical sense of judgment. or had shown a willingness to cut ethical corners that stood in the way of lucrative issues. This was particularly true of the bond issues of South American governments where there were implications of lax standards, excessive finders' fees, and inadequate disclosure to investors; and the eventual universal defaults and investors' losses were laid at the bankers' doors. Because of occasional abuses, such as price pegging during public offering and after, high-pressure sales methods, misleading prospectuses, private offering to favored influential persons, excessive profits of underwriting, failure to insist on protection to investors by sound indentures and the pre-emptive right, the Senate committee issued a general indictment of investment banking practices in 1934.

Securities Act of 1933.—Before the report of the Senate committee was issued, several acts were passed by Congress in the early wave of reform. Here we will be concerned only with the Securities Act of 1933. Its general purpose is simple, although its wording is complex and long, partly to make it escape-proof, and partly to impress upon the Supreme Court the right of the federal government to regulate the sale of new securities by use of the mails or of instrumentalities of interstate commerce.

The basic objective of the law is to insure that full disclosure of all relevant facts to prospective investors be made by the issuing corporation and the investment bankers. These facts must be filed with the Securities and Exchange Commission in the form of a lengthy and complicated registration statement. A period of twenty days is allowed for examination of the statement by the commission staff, and no sales of the security may be made until the expiration of this waiting period. If deficiencies are found by the staff, the corporation is given an informal opportunity to file an amendment; if the company refuses or if the commission is of the opinion that any statement is untrue, incomplete, or misleading, it may issue a stop order, which makes unlawful the sale of the issue.

If no deficiencies are found or if requirements for additional information have been met, the statement becomes effective twenty days after filing. Most of the information contained in the registration statement is repeated in the prospectus, a copy of which must be given to the prospective purchaser when the security is offered for sale. The more complete facts and documents contained in the registration statement are available to anyone who wishes to consult them in Washington or who is willing to pay the rather high cost of having photostatic copies made.

The commission does not check on all the statements to see that they are truthful and accurate, and the law specifically forbids issuers to state or imply that the commission has approved the issue, with its obvious implications. Rather, if the registration statement or prospectus contains misstatements or omissions of material facts, the law imposes individual liability on (1) the issuing corporation, (2) its chief officers, (3) all of its directors, and those who control officers and directors, (4) all underwriters or sellers of the security, and (5) all experts whose statements are included. Any purchaser of the security may bring suit against any or all of these groups if he sustains a loss and can show that the document contained a misstatement or an omission. The suit may be to recover damages, measured by the amount of his loss, or, in some cases, to rescind the entire transaction.

Since the law places the burden of proof on the seller rather than the buyer, the latter need not show that he relied on the untrue statement, or even that he read the prospectus or registration statement, or that there was any relationship between the untrue statement and his loss. This provision of the original act seemed to place an undue burden on the issuing corporations, underwriters, and their officers, for it provided an open invitation to a lawsuit whenever a purchaser suffered a loss from any cause whatever, particularly since the buyer may have bought the security second- or third-hand, as long as ten years after the original issuance.

In 1934 the law was amended to modify these needlessly harsh liabilities. Thereafter, those subject to suit could reduce their liability by the amount of loss they could prove was not related to the misstatement, and anyone who purchased the issue more than one year after it was originally sold had to show that he relied on the misstatement. Moreover, the period of liability was shortened from ten years to three years. The amended act is much like the original in a broad provision under which those subject to liability may escape if the misstatement was that of an expert, which they had no reason to disbelieve. For all other statements, they can escape liability by showing that after careful and diligent investigation, they believed them to be true and complete. The standard of diligence or care is that of a prudent man managing his own affairs. Moreover, underwriters (all selling banks and dealers) are now limited in liability to the amount they distribute; all other persons remain jointly or severally liable for the entire issue, with the right to force others to bear their share of the loss.

This right to sue is the backbone of the law. It was patterned after a similar but milder provision in the British Companies Act of 1929, which requires the filing of the prospectus with the Registrar of Companies when securities are offered to the public. However, British law provides for no careful investigation of the prospectus, requires no waiting period, does not provide for stop orders, exempts issues introduced via the stock exchange, requires only three or four pages of information in the prospectus, and, in suits for damages, places the burden of proof upon the plaintiff rather than upon the defendant.

As the result of the requirements of the Securities Act of 1933, the typical prospectus has become a voluminous and cumbersome thing—it is commonly called a telephone directory—

in contrast to the typical British prospectus covering a few pages at most. Of course it is completely unrealistic to expect that the average uninitiated investor will be enlightened by such a profusion of information; he is more likely to be confused by it. Many suggestions for simplifying the prospectus have been made, but little has been accomplished. Apparently bankers, dealers, and informed investors find the information helpful, and since they act as advisers to the investment community, the benefits filter down to the average individual investor.

The act exempts many issues from the registration and prospectus requirements. The most important of these are the issues of federal, state, and local governments (but not foreign governments), railroads, banks, and cooperatives. In addition, short-term loans of all corporations are exempted, as are issues of less than \$300,000 (originally it was \$100,000), if approved by the commission.

The commission is given wide powers to implement the law by making rules. Its orders are binding and can be upset only by court order. In litigation, the courts are required by the law to accept findings of fact by the commission if supported by evidence; thus the courts' power of review is limited. Violators of the law are punishable by a fine up to \$5,000 or imprisonment up to five years, or both.

It is important to note that the act of 1933 does not confine itself exclusively to the sale of new securities. Section 12 of the act makes sellers of any security, except government bonds, liable to buyers if they have misstated or failed to state material facts in the process of sale. More important, perhaps, is the fact that the law makes it a criminal offense against the federal government for anyone to sell any security by the use of the mails or instruments of interstate commerce, with intent to deceive or defraud. This adds another string to the bow aimed at fraudulent security sales. (The Postal Fraud Law also remains in effect.)

An evaluation of the Securities Act of 1933 would probably lead to the conclusion that the broad effect has been wholesome. However, the costs of complying with the act, the unknown liabilities imposed, and the possible repression of highly specu-

lative issues by the commission must be weighed against the benefits. Each of these aspects will be discussed in turn.

Cost of New Issues.—The costs of complying with the requirements of the act of 1933 can be sensed by anyone who compares the voluminous prospectuses that are now issued with the four-page leaflets that were common before 1933. The act calls for the filing of thirty-two different categories of information for the registration statement by corporations wishing to issue new securities. Included are copies of such documents as the articles of incorporation; management, service, and other unusual contracts; underwriting agreements; agreements and indentures covering stock and bond issues; opinions of counsel regarding the legality of the issues; information about the corporation, its directors, officers, and holders of more than 10 per cent of the stock; the nature of the business; capital structure; the purpose of the new issue; the amount and use of the proceeds; the commissions and costs of flotation of the issues; the proceeds of securities issued and payments to promoters during the past two years; identity of those selling property or good will to the corporation; stockholdings or other interests of directors, officers, and controlling persons; a balance sheet not more than ninety days old, and earnings statements for the past three years in forms prescribed by the commission.

All of this information, except copies of the documents, must be repeated in the prospectus, and the commission is given the authority to require additional information, if it deems it "necessary or appropriate in the public interest or for the protection of investors." Similarly, the commission may permit material to be omitted if it is deemed unnecessary for protection of the public. Since every potential investor must be given a copy of this usually bulky prospectus, the costs of printing are obviously high. But even greater are the costs of retaining the services of a host of attorneys, accountants, engineers, and other experts to provide the information in the proper form and to see that it is both adequate and accurate, under pain of personal liability to themselves, the directors and officers, and underwriters. The fee paid to the commission for registration

adds only slightly to the total expense, since it is imposed at the rate of one-hundredth of 1 per cent of the amount of the issue, with a minimum fee of \$25.

The commission has made various estimates of the cost of security flotations, distinguishing between bankers' commissions and other costs, such as printing, legal, and accounting expenses. Presumably, the latter are affected most by the registration requirements. Since other conditions are changing from time to time, it would be unsound to compare these costs over a period of years and hold only one variable accountable. However, it is not debatable that the act has increased the costs other than commissions; the only question is how much. For small issues, those less than \$5 million, the commission found that older methods involved other costs of about 0.8 per cent of bond issues and 0.7 per cent of preferred stock issues for the period 1925-29.1 For the period 1935-38 these costs had increased to 1.4 per cent for bond issues and 1.3 per cent for preferred stock issues almost double the pre-1933 costs. The commission found that practically all of this increase came from a sharp rise in the amounts spent for the services of lawyers and accountants and for printing costs—items which are closely related to the registration requirements.

Subsequent years found these other costs continuing to absorb over 1 per cent of the proceeds of small issues and about 0.5 per cent of large issues, both bonds and stocks. For 1945 the commission reported that about 0.5 per cent of the proceeds of all security issues was absorbed by registration costs, while bankers' commissions and discounts absorbed 3.2 per cent of the proceeds. Assuming that no large costs to the issuing corporation have been overlooked in these data, it would seem that the cost of compliance with the law is not prohibitive. Even though the cost has increased markedly, it is still less than 1 per cent, and its burden has been counterbalanced by a gradual but persistent downward tendency in bankers' commissions, which make up the bulk of the cost of floating new issues. In April, 1947, the Securities and Exchange Commission somewhat simplified the

¹ Securities and Exchange Commission, Statistical Series, Release No. 418, May, 1940.

registration form, but the work of preparation and the cost will probably not be appreciably reduced.

Personal Liabilities Under the Securities Act.—Of greater importance than costs as a deterrent to new issues have been the hazards of unlimited personal liability imposed by the Securities Act of 1933 upon corporate managements and underwriters. At first the implications looked serious, and many managements and underwriters hesitated to advance into the perils of the unknown. The general objectives of the act were entirely reasonable: the whole truth ought to be told by those trying to borrow money from the public. But if by reason of an oversight or lack of knowledge a material fact was omitted or misstated, without intention to deceive, the corporate management and the underwriters were liable not only to the original buyer but to subsequent buyers.

The only defense against this liability, other than immediate resignation, was that the defendant had made a reasonable investigation and had reasonable ground to believe, and actually did believe, that the statement was true and complete. But what is "reasonable" in such a case? This was the bothersome question that disturbed the vast majority of honest, yet cautious, managements and bankers.

In the course of time, the most extreme fears subsided. The harsh liabilities in the original act were modified by extensive amendments, in 1934. Under these amendments, defendants in damage suits were permitted to reduce their liabilities by the amounts they were able to prove were not due to untruths or omissions. Buyers of the security after one year from the date of issue had to prove reliance on the untrue registration statement to recover under the act. The duration of liability was shortened from ten years to three years from the date of public offering, and to one year after discovery of the untrue or incomplete statement. More important, the standard of reasonable investigation and the grounds for belief were made more objective, more uniform, and less strict, by substituting the concept of the "prudent man managing his own property" for the vague and stricter rule of "fiduciary relationship." To stop nuisance suits (brought by

lawyers with a hope of a settlement to avoid adverse publicity) courts were given the discretion to assess costs, including counsel fees, against one making a claim found to be without merit. Moreover, the act was clarified to absolve from liability those who complied with rules and regulations of the commission, even though such rules were later amended or declared invalid.

The fears of investment bankers and dealers were quieted by limiting the liability of each to the amount underwritten and sold by them individually. Previously, each had been liable for the entire issue.

As time went on and the investment community had more experience with the law, it was natural to expect a gradual adjustment to and acceptance of the act. New issues were brought out without dire consequences. In fact, suits for recovery under the act have been noticeable by their rarity. An epidemic of security losses characteristic of the depression of 1929-32 might possibly cause a mushroom growth of lawsuits, for investors (or their lawyers) might seek to recover their losses by tracking down misstatements in old registration statements and prospectuses, but there is no evidence that most of these would succeed. given the limitations imposed by the amendments to the act. However, until our courts pass on enough cases to establish a reliable legal tradition, it is risky to speculate about the outcome of such suits. The investment community has long wanted further amendments to the act to expedite new issues and cut down the cumbersome work of compliance, but most bankers and dealers seem to have lost their first fears of the liability provisions of the law.

Finally, there has been a tendency for corporations to relieve directors of the hazards of personal liability under the act. Many corporations, in an effort to attract competent directors, have adopted bylaws under which they agree to indemnify directors who incur liability through no fault of their own. While it is obvious that this practical immunity has its dangers, it does make it more attractive to directors who are appointed for the advice they can give to management rather than for their detailed knowledge of the corporation, its management, and its affairs.

Suppression of Risky Issues.—The third large question of the effects of the act of 1933 is the extent to which the commission has impeded the flotation of new issues, particularly risky issues, by acting as a judge of investment quality rather than merely seeing that the whole truth is told. This is of great importance since the two objectives are quite different.

The theory of the act is that investors should be allowed to choose their securities once they have been told the truth. It is the privilege of investors to buy wisely or unwisely, to take speculative risks, even inordinate ones, and lose their last dollar. The function of the commission is not to direct the employment of capital for the investor or for society. It must try to distinguish between a speculative venture which is legitimate, though highly risky, and one based on misrepresentation and fraud. It is supposed to protect the investor only from the latter, not from speculative losses.

How well it has accomplished this objective is a matter of opinion. Perhaps in its vigilance to protect the investor from misinformation, it has also discouraged the sale of issues in new concerns that had little likelihood of success for one reason or another, under the guise that information was misleading or inadequate. Sometimes, the requirement that an issuer actually emphasize its defects, rather than barely mention them, dooms the issue marketwise and discourages the sale of highly risky securities.

A brief sampling of commission rulings on this point is helpful. It has repeatedly denied its power to veto new issues if they are honestly represented. In one case it said, "As we have said before, our powers do not extend to preventing the public offering of a security if the truth concerning it is told, but the truth, under the Congressional mandate embodied in the Act, means the full truth." Under this general principle, it has disapproved of such practices as the artificial valuation of assets for the purpose of stock issuance; the inclusion of promotion expenses, bonuses, and early losses in the capital accounts; the improper valuation of intangibles such as patent rights; the write-ups of

² S.E.C. Decision 214 (1935).

property values; the overstatement of earnings; the underemphasis on risks involved in issuing bonds; and the use of misleading words like "gold" and "bond." Stop orders have been issued where the nature of the business has not been clearly portraved, where the payment to management was misrepresented, where compensation to underwriters and options were not adequately disclosed, where the sale of securities was accompanied by market manipulation and securities were sold at varying prices, where earnings were not stated according to the commission's interpretation of proper accounting practices, or where the audit of accounts was inadequate. It has also disapproved of new issues of stock where promoters' rewards were considered to be grossly excessive, where management's past record was misrepresented, where experts' opinions were those not of real but of "synthetic" experts, or where the presence of valuable metals or oil was indicated by "doodlebugs" or based upon the reports of pseudo-scientists not careful in their use of words.

Overly optimistic forecasts, based only on hopes, are frowned upon by the commission since they mislead the investor. An optimistic estimate of profits to be made by a distillery claiming it could produce whiskey at 40 cents a gallon was held to be misleading, when, in fact, other distilleries were then selling unaged bourbon at 30 cents per gallon. When the company did not disclose the obstacles to producing at a figure as low as 40 cents, a stop order was issued. The order was further justified because the president of the company was represented as being more competent than past experience proved him to be. The commission has also objected to stock issues where the paid-in surplus account rather than the capital stock account is credited with initial payments for stock; or where dividends on common stock have been paid largely from surplus paid in by preferred stock and not from earnings. It has condemned failure to disclose contingent liabilities, treatment of unrealized capital gains as "profits," overstatement of earnings by arbitrarily low charges for depreciation or depletion, and failure to carry out intentions expressed in the prospectus. Stop orders have been issued for these and other reasons. Where a patented telephone device is the basis of a business seeking to sell stock, potential investors must be specifically warned of the possibilities of costly suits for patent infringment and of the hazards of competition faced by the company. In a case where assets included "donated shares" and were acquired in exchange for stock at a greatly inflated price, the commission issued a stop order. In another case failure to disclose labor difficulties and an impending strike was held to be misleading.

Enough has been said to indicate that in such cases matters of judgment and prevailing practices are involved. It appears that the commission has been skeptical of the loose stock issuance which has been characteristic of American corporate finance and which gave incentives to the promoter in the past. It frequently disapproves of the rosy pictures so often painted in prospectuses. although forecasts may be subject to personal opinion rather than to objective proof or disproof. There is some evidence that the S.E.C. is prepared to issue stop orders when the promoter is paid too much for his services, or when he gets control over the corporation far out of line with his investment. Whether this is merely assurance of adequate and truthful information, or a disguised reform of corporate promotional practices, or a paternalistic regard for what is good for the investor can only be conjectured. Perhaps some kernels of wheat have been eliminated along with the chaff.

The commission has showed a sympathetic interest in recommendations of investment bankers and others for a change in the act. Amendments raising the exemption from \$100,000 to \$300,000 and giving the commission the discretion to shorten the waiting period in some cases have been adopted. In June, 1947, the staff of the commission recommended that advance notices and tentative offers of new securities be permitted during the waiting period to expedite the sale of new issues. In July, 1948, the commission announced that it had under consideration a change in its rules to encourage the use of the preliminary prospectus ("red herring") to expedite new offerings. Perhaps some relaxation to facilitate the flotation of new issues is in order and may come in time. Meantime, the verdict would probably be that, in general, the act of 1933 has been of genuine advantage and is here to stay. If error has been made, it has been in the

direction of overregulation rather than the reverse, and there seems to be a genuine feeling on the part of the present members of the commission that all impediments unnecessary to protect the investor should be removed.

Fraud.—The commission has also met with some success in enforcing the antifraud sections of the law. Its greatest handicap has been its inability to control security sales originating outside United States borders. During the recent past, there has been an epidemic of goldmining promotions in Canada, many of them organized to sell stock in the United States. People whose names were chosen from "sucker lists" were deluged with high-pressure appeals by mail, wire, or telephone. Some real discoveries gave credence to claims of fabulous profits to be had from investing in mining stock at one or two dollars a share. Detailed maps, buttressed by geologists' reports and made glamourous by such magic names as "Yellowknife" or "Porcupine," with the usual protestations of honesty and lack of promoters' profits—"no commissions, no brokers, no options" were the same old bait for the gullible. Some of these projects were no doubt legitimate but they did not comply with the requirements of the Securities Act, and all too frequently they were a kind of imported swindle.

Sometimes the promoters were Americans who made a sojourn to Canada to ply their trade. A recent episode is fairly typical. A Brooklyn automobile salesman found stock selling to his liking. After being indicted in a stock deal in the state of New York, he moved to Canada where he sold stock on a small scale; later he expanded operations. It was estimated that in two years he sold close to \$3 million worth of stock across the border to residents of the United States. Most of this was stock of a tantalum mine which he had bought for 15 to 30 cents a share and sold for \$1 to \$3 a share. The mine was reported in existence but was incapable of operation because of the high cost of extraction. Out of profits of about \$1,500,000, the salesman built a \$250,000 home in Toronto, owned a \$150,000 plane, and lived in luxury on the proceeds of the sale of stock to investors in nearly all the forty-eight states. He was indicted in Cleve-

land in June, 1946, and was seized in New York when he made a visit there by plane in December, 1947. He was charged with using the mails to defraud, with violation of the Securities Act of 1933, and with conspiracy. The moral of the incident is that it is still possible for trusting investors, who hope to get something for nothing by buying stock, to lose their last dollar without much difficulty.

Securities Exchange Act of 1934.—This act is designed to regulate the dealing in outstanding (or secondhand) securities; it is not immediately concerned with newly issued securities except as they are bought and sold on one of the stock exchanges. Thus new issues of listed corporations become subject to the act of 1934 while those of newly created corporations do not since they are "unseasoned" and are not eligible for listing on the stock exchanges.

Under the act all exchanges must submit to government control by registering with the Securities and Exchange Commission. Each exchange agrees to enforce rules under the act upon its members, and to provide for their "expulsion, suspension or disciplining . . . [for] conduct or proceeding inconsistent with just and equitable principles of trade."

The act also regulates brokers and dealers who trade on the exchanges in the following respects: (1) The Board of Governors of the Federal Reserve System is given authority to prescribe margin requirements and rules for credit extension. (2) Brokers' indebtedness to all other persons may be regulated and such indebtedness shall not exceed twenty times the net capital of the firm. This is primarily to prevent insolvency. (3) Brokers may not lend customers' securities without their consent. (4) The manipulation of stock prices by wash sales, excessive activity, and misleading statements is made unlawful. (5) Options (puts, calls, straddles, spreads) and short selling are to be regulated by the commission. (6) The commission was ordered to make a study of the segregation of brokers' and dealers' functions. Where a member acts as a broker by executing orders for others, and also trades for himself as a dealer, an inevitable conflict of interests arises. This is particularly true

of the "specialist" who buys and sells one or more stocks for his own account and also holds orders from other brokers to buy and sell these same stocks for customers. To date the commission has not ordered the complete segregation of functions, but has prescribed rules designed to keep a dealer from taking advantage of his position as a broker for others.

Finally, the act of 1934 attempts to reach the corporations whose securities are listed on the exchanges. Corporations must register with the exchange by filing financial statements and other information that the Securities and Exchange Commission shall prescribe. This information must be kept up to date. Confidential information will be disclosed to the public only if the commission believes such disclosure to be in the public interest. Moreover, managements of listed corporations must observe certain restrictions. They may solicit proxies only under commission rules requiring that the stockholder be given information concerning the purpose for which the proxy is solicited. Usually proxy requests for the annual meeting must provide the latest financial information, a statement of the salaries of management, and the amount of their stockholdings. Moreover, to prevent misuse of inside information for their personal profit, officers, directors, or owners of more than 10 per cent of the stock must report monthly any changes in their holdings of stock, and they are liable to the corporation for any profits made from the purchase or sale of stock held for less than six months. This provision has severely restricted management trading in the stocks of their companies, and is commonly believed to be a cause of "thin" markets for stocks.

The commission is given sweeping powers to make rules and regulations concerning exchanges, brokers, and listed securities. It can, if need be, suspend or withdraw registration of exchanges, dealers, and securities. Criminal penalties are provided for violation of the law, and civil suits may be filed by those who are victims of false or misleading statements.

Over-the-Counter Market Regulation.—The problem of how to regulate the great mass of security transactions that takes place daily in the over-the-counter market—that is, between

dealers and not on any exchange—took some time to solve. The commission was given power to make rules for these transactions in the act of 1934, but it limited its initial activity to screening the legitimate dealers and registering only those who furnished it truthful information and had not been convicted of shady dealings in securities. After considerable consultation with investment dealers, a program of self-regulation was worked out and enacted into law as the Maloney amendment in 1938. Under its provisions brokers and dealers organized themselves into voluntary district associations with the power to suspend members who failed to observe the rules of practice adopted by the associations and approved by the commission. Thus, the vast unorganized market is disciplined under the general auspices of the regional associations, which are bound together by the National Association of Security Dealers. At the top is the Securities and Exchange Commission which acts in a supervisory capacity and as a sort of court of appeals for disciplinary decisions. Sometimes it has upheld disciplinary measures, and sometimes it has reversed them. Thus, the act of 1934 provides for the buyers and sellers of outstanding securities some of the protection afforded by the act of 1933 to the buyers of new securities.

The Public Utility Act of 1935.—This law, passed for the purpose of breaking up and regulating holding companies in electric and gas utilities, gives the Securities and Exchange Commission considerable authority over the financial policies of holding companies and their subsidiaries. Here the primary purpose is to protect the operating companies, not the investor. To this end the commission is given a wide grant of authority over nearly all financial activities.

The act provides: (1) New securities may be issued by holding and operating companies only with the consent of the commission. (2) Securities or other utility assets may be acquired or sold only with the consent of the commission. (3) Intercompany loans and dividends are subject to commission control. (4) Plans for breaking up holding company systems and the correlative changes in securities outstanding must be approved

by the commission. (5) Only nonprofit service and construction companies are permitted, subject to commission approval. (6) The commission may prescribe the forms of accounts and records, and order reports to be made. (7) Officers and directors are required to disclose changes in security holdings and are liable to the corporation for profits made in security transactions completed within a period of six months.

Little emphasis upon the administration of the act as a whole is needed here. The requirement of competitive bidding for newly issued securities has been discussed previously, and it is of interest to note the way in which the commission has exercised its discretion in permission to issue securities. In so far as its decisions in actual cases reflect a definite policy, it might be said to be as follows.

First, although the act limits new issues of securities to common stocks and secured bonds, the commission may approve and has approved many kinds of securities, ranging from secured bonds and notes through debenture bonds, serial notes, income bonds, unsecured notes, convertible bonds, scrip, guaranteed securities, and preferred and common stock. These have been issued for the usual corporate purposes, such as construction, working capital, refunding, consolidation, recapitalization, and even for the payment of interest and dividends.

Second, a major objective of the commission has been to encourage utilities to avoid excessive debt, but its debt limits have been rather elastic ones. The commission is said to regard a capital structure of 50 per cent bonds, 25 per cent preferred stock, and 25 per cent common stock and surplus as ideal for electric utilities, but it has not dogmatically followed this rule in its decisions. Usually 60 per cent in bonded debt is considered reasonable in financial circles, and the commission has even permitted new bonds to be issued where the bonded debt was 70 per cent or more. Frequently there is no easy alternative. Bonds to refund existing issues are more likely to be approved than those for new capital, if bond capitalization is high and new stock can be sold. Sometimes the commission has taken what seems to be an arbitrary position in this matter. Thus, in 1939, by a three-to-two decision, it refused to permit the Con-

sumers Power Company to obtain new capital by issuing bonds even though its capitalization after such issue would have been 52.3 per cent bonds, 27.7 per cent preferred stock, and 20.0 per cent common stock and surplus, with interest requirements earned 3.0 times. Although The Michigan Public Service Commission had given its approval to the bond issue, the Securities and Exchange Commission decided that common stock should be issued for the new capital, despite the fact that bonds could be sold on a 3 per cent basis as compared with an earnings yield of over 9 per cent for the stock. In later cases the commission modified this opinion, frequently permitting bonds to be issued for new capital where the issuing companies had even higher debt ratios.

In addition to determining the type of security, the commission has passed on many other matters, such as rates of interest or dividend, voting power, duties and qualifications of trustees, accounting practices, security pledged, short-term borrowing, and dividend policies. Perhaps its policies in these respects can best be described as orthodox and realistic. The requirements of each particular case are usually the ruling consideration. For example, although short-term borrowing to finance long-term investment in utilities' plant and equipment is risky, the commission has allowed it, within limits, where lower cost and convenience favor it. Where debt is considered excessive, the commission has frequently conditioned its approval of new bond issues upon indenture clauses which freeze the surplus by limiting dividends on common stock to future earnings computed after adequate provision for maintenance and depreciation. Serial maturities or sinking funds are sometimes required to reduce debt in the future. Occasionally strengthening of old indentures is required as a condition of new issues. Repurchases of securities are permitted only with regard to seniority of claim and after each holder is given equal opportunity to sell. Trustees under indentures are required to be free of interests conflicting with those of bondholders. Underwriting commissions are closely controlled.

In other areas of utility finance the commission has also made a multitude of decisions that cannot be elaborated here. Dividend policy is regulated for the purpose of conserving working capital and protecting the claims of creditors and preferred stockholders. Dividends from surplus arising out of revaluation of assets have met with Commmission disapproval, but requests to pay dividends from unearned surplus are frequently granted. The creation of surplus to absorb property losses by a writedown of capital stock, so as to permit dividends from current earnings, has been allowed in at least one case.

In passing upon plans for the simplification of utility holding company systems or for the reorganization of bankrupt utilities subject to its jurisdiction, the commission has had ample opportunity to interpret and protect the rights of security holders and to implement its opinions about sound financial policy. With literally hundreds of millions of dollars in property rights at stake, this has been a power of far-reaching consequence. It has consistently heeded certain basic precepts in its decisions and reports. The most important and controversial of these is its insistence upon the absolute priority of the rights of creditors to assets and earnings, and it usually has refused to permit stockholders to participate in reorganization plans or the distribution of assets unless creditors' claims have been met in full and in order of priority, according to the strict letter of the contract or charter. On the other hand, debts owed by subsidiaries to holding companies have frequently been subordinated to preferred stock held by the public where the holding company's debt claim arose from transactions questioned by the commission, thus upsetting strict legal rights and substituting equitable claims. Voting power has been transferred from common stock to preferred stock or even to bonds when the commission decided that it was inequitably distributed because of the small asset or earnings claim of the junior stock. It has spurred trustees to act on behalf of bondholders. It has disapproved of the delegation of excessive power to protective committees and frowned upon clearly unreasonable charges and costs in reorganizations.

On the whole, perhaps, it can be said that in this utility field, where the commission has greater power to determine more phases of financial policy than in any other, its attitude has been both realistic and reformist. It has attempted to remove abuses

and follow general standards of financial practice that have long been accepted by the better companies. Many have objected to its rigid insistence upon a reorganization policy that nearly always denies stockholders any chance to recoup their losses. Others have regarded as arbitrary and cavalier the commission's tendency to disregard existing property rights, voting rights, or creditors' claims. Opinions vary as to whether the commission could have accomplished its purpose in a less arbitrary way. But with its help—or without it—the corporate structures of electric utilities are now in healthier shape than before the act was passed, although possibly at great cost to some investors in holding company securities. One thing is certain, and that is that the utility industry has not found it easy to sell new common stock issues advantageously for many years. Most of the financing continues to be done with bonds or with term loans from financial institutions, and only a small proportion of new capital has been raised by common stock issues. But this may be temporary and due to forces beyond the control of the commission.

Other Regulation of Securities: Reorganization.—The capital structures and financial plans of corporations (other than railroads and banks) undergoing reorganization under the new Bankruptcy Act may be materially affected by the advisory opinions of the Securities and Exchange Commission. In order to protect the investor and give bankruptcy courts the benefit of an impartial analysis of plans for reorganization, the Chandler Act of 1938 provided that the courts might ask the commission for an advisory opinion if the indebtedness of the bankrupt corporation was not over \$3 million. For reorganizations involving larger indebtedness such an opinion is mandatory. The courts and the security holders may or may not follow the advice of the commission, but its comments on the adequacy and fairness of the proposed plans usually carry considerable weight.

Somewhat greater powers have been granted to the Interstate Commerce Commission with respect to railroad financing and reorganization. The Transportation Act of 1920 empowered that commission to control new security issues of railroads, just as many state commissions had been given authority to approve

or deny requests of public utilities for new issues. Control over railroad capitalization had long been urged in some quarters, but it was not until 1920 that it was finally granted, along with many other powers designed to assure a sound and adequate railroad system. In 1933 this control was expanded under an amendment (Section 77) to the Bankruptcy Act under which the I.C.C. was given direct control over the plans of reorganization for failed railroads. This is not merely an advisory opinion, as with the S.E.C. in nonrailroad reorganizations. Under the law, a plan of reorganization must be approved by the I.C.C. before it goes to the court. If the court disapproves, the plan is dismissed or referred back to the I.C.C. Upon acceptance by two-thirds of each class of creditors (and stockholders, if the company is solvent), the court confirms the plan and it goes into effect. This gives the I.C.C. large power to shape the financial plan for the reorganized railroad and to determine the property rights of the old security holders. Its plans usually have called for a drastic scaling down of capital structures in line with the reduced earning power of the railroads during the depression.

The Trust Indenture Act of 1939.—This act was passed by Congress, as an amendment to the Securities Act of 1933, to correct some abuses and laxities that were found to exist among trustees, usually banks and trust companies, under corporate bond indentures. It was designed to make the trustee an active protector of the bondholder rather than a passive "holder of stakes." To this end, trustees under new trust indentures (old indentures are not affected) must accept certain minimum responsibilities regarding authentication, action in default, and release and substitution of security if the bond issue is to be qualified for sale in interstate commerce. Railroad, government, and other securities not subject to the Securities Act of 1933 are exempt. Ordinarily, a trustee must not loan money to the corporation or have any claims antagonistic to that of the bondholders, nor can he advance a "rescue loan" to the corporation in time of trouble without the risk of losing it if the corporation fails within four months. "Exculpatory clauses," under which trustees disclaim liability for anything they may or may not do, are discouraged or kept within reasonable bounds. Affiliations between trustees, issuers, and underwriters are forbidden. Trustees are expected to act promptly and vigorously to enforce the provisions of indenture agreements. Here again, both the act and S.E.C. orders have made compulsory and universal many of the obligations that were voluntarily assumed by the more vigilant and efficient trustees.

The Investment Company Act of 1940.—The power of the Securities and Exchange Commission over financial practices has been extended to investment companies, or investment trusts as they are more commonly known. These companies had been subject to a long investigation by the commission under the provisions of the Public Utility Act of 1935. They had been organized by the dozens to invest the public's money in securities, largely in common stocks, during the New Era of the 1920's. Along with the many legitimate though speculative concerns of this nature, there developed a fringe that sought to control and promote investment companies for their private gain. With the sharp decline in stock prices and investor losses in this, as in other fields, the whole development came under a cloud of suspicion.

The commission did nothing to dispel this cloud; in fact, it fastened its attention on the abuses and deficiencies that had grown up, and it even intimated that investors' losses were due largely to chicanery rather than to the drop in stock prices. Among the abuses were "selfdealing" whereby sponsors, directors, and affiliated institutions would unload poor securities on the trust, often at a profit to themselves and in violation of sound policies of investment diversification. Sometimes company funds were used to support the market for a stock in which affiliates had an interest. Because of losses many common stocks of investment companies with senior securities were "under water," i.e., their book value was zero or less. Their sponsors sold, traded, or consolidated them without regard to the welfare of the security holders. Occasionally unscrupulous persons obtained control and then proceeded to "loot" the trust of its portfolio of securities and pay themselves large fees, commissions. or salaries.

Investment policy was frequently changed without notifying the security holders or getting their consent; thus, instead of a diversified investment portfolio, some firms wound up holding little else than the questionable securities of some pet project of the management. Unreasonably large management fees and profitable stock options were given by managements to themselves. The commission believed that senior capital in the form of bonds tempted management to engage in risky speculation to multiply the gains for stockholders. It found frequent inadequacies in accounting, particularly the confusion of capital gains with income. It found that a continuous crop of new issues was brought out largely to "switch" the customer from old issues and obtain a second sales commission and loading charge.

Members of the industry denied the prevalence of wrongdoing, and tried to show that investors' losses were due to general market shrinkage. One exhibit showed that investment trusts had preserved 56 per cent of their assets from 1929 to 1935, while all newly issued bonds in 1929 preserved 74 per cent, preferred stocks 47 per cent, and common stocks 33 per cent of their issue prices.

At any rate, the Securities and Exchange Commission recommended strict regulation of investment companies and prepared a bill to that effect. The industry objected strenuously, and finally the commission and representatives of the industry sat down and wrote out a memorandum which became the basis for the law. (This is one instance in which an industry has had a major voice in its own regulation.)

The act of 1940 gave the S.E.C. a large measure of discretion over the industry. The law required that each company announce its investment policy clearly (and adhere to it) by registering and filing information with the commission. The commission could not deny a firm entry into the business if it filed accurate information. Different provisions of the law applied to different types of companies (management companies, unit or fixed trusts, and face-account certificate companies). No new company can be organized with less than \$100,000 net worth, but no maximum limit in size is prescribed. Persons with court records for security frauds may not serve as officers

of investment trusts. At least two-fifths of the board of directors must be persons outside of the company's management. Transactions with interlocking companies are forbidden, and no trust shall have as a majority of its directors persons who are directors of a bank. Securities may not be purchased from an affiliated person who is a member of an underwriting or selling syndicate. Selfdealing (with promoters, officers, directors) is prohibited. Directors may not be excused (by contract) for actions in bad faith or involving gross negligence.

Conversion of funds or embezzlement is made a federal offense, punishable by a fine of \$10,000 or imprisonment for two years or both. Officers and directors must report stockholdings and are liable to the company for profits on transactions completed within six months. Voting trusts are prohibited, and the proxy machinery is placed under supervision of the commission. Contracts for investment advice must be in writing and approved by a majority of the voting securities, and be terminable without penalty in sixty days. To protect against dilution, no new stock may be issued for property or services. Companies may repurchase their securities only after notice. Stockholders must be given complete and accurate accounting reports certified by an independent auditor whose appointment is ratified by the stockholders. Dividend payments out of earnings and out of capital must be carefully distinguished. The commission may help security holders by giving advisory opinions on plans for recapitalization or reorganization.

Margin trading, short selling, and participation in joint trading accounts are prohibited, except as the commission may permit. Some companies may underwrite new security issues if such commitments do not exceed 25 per cent of total assets. A company's holdings of stock in other investment companies is strictly limited. A company may subscribe up to 5 per cent of total assets to the capital stock of a corporation to provide "venture capital" to industry. It may borrow by issuing bonds up to one-third of the assets and by selling preferred stocks up to one-half of the assets. Should asset coverage fall below these amounts, no common stock dividends may be paid. Bondholders may elect a majority of directors if asset coverage falls

below 100 per cent. All new stocks have full voting rights, and preferred stock may elect the majority of the board of directors (subject to the bondholders' right) if dividends are unpaid for two years. Stock options may not be of more than four months' duration. (These apply to new issues in addition to those already outstanding.) Bank borrowing is limited to one-third of the assets. Loans to controlling persons are prohibited. Sales loads are prescribed in some cases. Misrepresentations by misleading title names or statements are unlawful.

These and other detailed provisions are enumerated to show how far federal regulation has gone in at least one field to protect the investor. It will be noted that security holders in investment trusts are given more protection than those in ordinary corporations. Yet with the notable exception of open-end companies, investment trusts have not enjoyed increased popularity or prestige since 1940. While the protection is no doubt helpful, the success of this as of any other business concern is likely to lie in the ability and integrity of management rather than in regulation. Almost a decade has elapsed since the law was passed, and the state of investor preference for most investment trusts seems to continue at a low ebb. Most of the common stocks of closed-end companies (which do not buy back their shares) persistently sell in the market at prices well below their asset or liquidating values.

REFERENCES FOR FURTHER READING

Atkins, W. E., Edwards, G. W., and Moulton, H. G. The Regulation of the Security Markets. (Washington: The Brookings Institution, 1946). Cherrington, H. V. The Investor and the Securities Act. (Washington:

American Council on Public Affairs, 1942).

Dice, C. A., and Eiteman, W. J. The Stock Market. (New York: McGraw-Hill Book Co., Inc., 1941).

Fainsod, M., and Gordon, L. Government and the American Economy. (New York: W. W. Norton & Co., Inc., 1941), Ch. 12.

Haven, T. K. Investment Banking Under the Securities and Exchange Commission. (Ann Arbor: University of Michigan, 1940).

Husband, W. H., and Dockeray, J. C. Modern Corporation Finance, rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Chs. 20, 21.

Jome, H. L. Corporation Finance. (New York: Henry Holt & Co., 1948), Chs. 22, 24.

Koontz, H. D. Government Control of Business. (Boston: Houghton Mifflin Co., 1941), Chs. 21-23.

Lyon, Hastings. Corporations and Their Financing. (Boston: D. C. Heath & Co., 1938), Chs. 48-55.

Stein, Emanuel. Government and the Investor. (New York: Farrar & Rinehart, Inc., 1941).

Chapter 12

FINANCING OPERATIONS

Raising capital to meet the initial requirements of a business is only a part of the financial task that must be performed. While it is important to make certain that the corporation is launched with adequate capital and a soundly conceived capital structure, the success or failure of the business is likely to be determined by how well its management copes with the problems of selling the product, producing it efficiently, and buying materials and labor advantageously. All of these phases of a corporation's business require sound financial management. An otherwise healthy business can quickly get into difficulty because of insufficient cash or working capital, which in turn may be due to an inadequate or unsound financial plan or to the careless. profligate, or wasteful administration of current capital. Frequently, inadequate current capital is more a symptom than a cause of deep-seated business trouble, but there can be no doubt that unwise financial management can be a potent independent source of trouble.

The art of financial management is a technical and complicated one. It involves the preparation of a financial budget, the proper handling of cash, bank accounts, and other cash resources, the forecasting of changes in cash requirements due to seasonal influences or variations in the business cycle, the determination of the best sources of funds, and decisions as to whether cash dividends should be paid and in what amounts. No attempt is made here to treat the procedures of a typical business in detail, or to elaborate on the functions and duties of the financial officers of the corporation. (Rather, the purpose is to achieve perspective concerning the nature and scope of the problems that the typical business corporation will face after it is organized and begins operations.)

Role of Current Capital.—At the time of organization, the financial plan should provide for the basic requirements for current (circulating) capital as well as fixed capital. In fact, many types of business employ much more current than fixed capital. Concerns engaged in retail or wholesale trade, as related, have most of their capital tied up in inventories, cash, and accounts receivable. They frequently do not own the buildings they occupy and their fixed capital is limited to building improvements and fixtures, which require only a small amount of capital. Yet large amounts of capital are needed to finance inventories and receivables. Similarly, some manufacturing concerns may have much more capital tied up in assets that in the ordinary course of the business are constantly changing form than in lands, buildings, and machinery. This is particularly true of corporations which because of seasonal markets or unsteady flows of raw materials must hold large inventories at times. Woolen companies must usually take a long position in raw wool since different grades of wool come into the market at different times of the year, and the raw material must be acquired while it is available. Before the advent of synthetic rubber, it was customary for tire and rubber manufacturing companies to buy crude rubber in the East Indies six months before it was expected to be processed. Similarly, cotton is usually purchased a month or two in advance. Meat-packing companies even out seasonal variations in the marketing of meat animals by inventory accumulations and reductions.

Before pursuing the matter further, it is well to define terms a little more precisely for purposes of clarity. The type of capital we have been discussing has been variously designated as "current capital," "circulating capital," and "working capital." Perhaps the latter is the most widely used term in financial circles. Yet it is defective because it is used to mean either of two things. On the one hand it is used to mean the sum total of current capital items; this is the sense in which it has been used above. But "working capital" usually means current assets minus current liabilities, in this sense it is not an aggregate but the difference between two aggregates. Thus a firm might have \$10 million of current capital, but if it also had \$10 million of

current liabilities its working capital would be zero. Therefore, it is always necessary to inquire whether the user of the term means working capital in the aggregate or in the net sense. This confusion is avoided by the use of terms like "current capital" or "circulating capital," although "working capital" is commonly used in the aggregate sense. Where the difference between current assets and current liabilities is meant, it is much better to use the term "net working capital."

The importance of providing a sufficient amount of current capital in the original financial plan cannot be overemphasized. Frequently, early failures can be traced to inadequate provision for the cash, raw materials, and inventories of finished goods that are needed in business operations. If funds for the fixed assets are raised, it is erroneously assumed that all will be well, that cash for operations will somehow become available from banks or other sources. There is no more costly delusion than an oversanguine forecast of the ease of securing working capital after a great deal of fixed capital has been obtained and the corporation's borrowing capacity is exhausted. Yet the whole investment in physical assets is likely to be lost if the lack of current capital prevents operations from being carried on successfully.

For new corporations, therefore, the initial financial plan must incorporate current capital as part of the over-all requirements and treat it as indispensable, and as irretrievably committed to the enterprise as the fixed capital, for it cannot be withdrawn without curtailing operations.

Current Capital Requirements.—The amount of current capital to be raised depends upon many factors. One factor is the length of the production and payment cycle, that is, the time it takes to convert cash into raw materials, into finished products, into accounts receivable, and then into cash again. If each of these stages takes a long time, the amount of current capital will be large relative to total sales; if each stage takes little time, a small amount of working capital will do the job because the turnover of current capital (sales : current capital) is greater. Another way of saying the same thing is that in some types of

business the cash-materials-receivables-cash cycle is very short and can be completed several times during a year. Some of the stages may even be skipped altogether, as when a firm sells for cash only and so ties up no capital in receivables.

A second factor is that some firms engage in more stages of production than do other firms—that is, they are *integrated*. A completely integrated steel concern, for instance, will own or lease iron ore mines, coal mines, railroads, cargo vessels, and various fabricating plants, as well as engage in the basic business of converting pig iron or scrap iron into steel.) Obviously, it takes longer to mine ore and coal, transport it, convert it into pig iron, then into steel, and fabricate the finished product, than it does to buy pig iron and manufacture and sell unfinished steel. Much less current capital is needed relative to a given volume of sales if a firm is engaged in only one step in the production of the finished goods.

A third factor is that the firm which has raw materials and supplies close at hand needs to tie up less capital in inventories than firms whose raw materials must come halfway around the world or are available only at certain seasons of the year. Similarly, nearness to markets, and sales for cash rather than on credit, or on short-term credit rather than long-term credit, reduce the need for current capital. Improved transportation and communication have greatly reduced the need for advance buying and inventory accumulation. Moreover, modern management is aware of the risks and inefficiencies of overstocking and strives for rapid turnover.

A fourth factor is that the absolute need for current capital will depend upon whether prices of commodities are high or low. The inflationary movements in commodity prices after World War I, and again after World War II, sent corporation managers scurrying to find additional short-term capital.) The rise in wholesale commodity prices from 80 in 1936 (1926 = 100) to about 160 in 1947, together with the larger volume of goods produced and distributed under the boom conditions that followed the war, multiplied current capital requirements several fold. Fortunately, corporations increased their holdings of cash and marketable government bonds from \$13 billion in

1939 to \$43 billion in 1945, but even then most of them had to sell new securities, borrow from banks, and restrict dividends on their stocks to meet the need. By 1947, cash and government bonds had been drawn down to \$34 billion to meet the new requirements. In the same year corporate inventories reached \$40 billion as against \$18 billion in 1939, and receivables reached \$32 billion as compared with \$22 billion in 1939. Total current assets owned by all corporations reached \$108 billion in 1947, practically double their amount in 1939, while total current liabilities were \$48 billion, about 60 per cent above 1939. (Net working capital rose from \$25 billion in 1939 to \$60 billion in 1947.) This is probably one of the most impressive increases in current capital ever registered by American corporations, and part of it can be attributed to the marked rise in commodity prices. If prices were to return to their 1939 levels, the same volume of goods and services could be produced and sold with a much smaller volume of current capital.

It might be pointed out that inflation and deflation of commodity prices eventually affect the need for fixed capital also; but the need is not so apparent because buildings and machinery are replaced only slowly, and land is never replaced. Furthermore, under accepted accounting practice fixed capital is depreciated on the basis of original cost; depreciation reserves, even when prices are rising, are not built up to provide for the actual cost of replacing buildings and equipment. If the cost of replacing physical assets were reflected in the depreciation charges, then in periods of inflation earnings would be lower and a smaller amount would be available for dividends; and in periods of deflation earnings would be larger and a greater amount would be available for dividends. However, what the accounts fail to show, careful management can easily discern, and in inflationary periods a company is likely to follow a conservative 'dividend policy to conserve working capital, no matter how high the reported profits. Thus, it can be seen that during inflation! the replacement of plant and equipment is a drain on working capital because depreciation reserves are inadequate, and current capital tends to be transformed into fixed capital.

A fifth factor is that the amount of current capital required

by corporations in some industries will vary from time to time, even if commodity prices remain relatively stable. In some businesses sales are larger at certain seasons of the year than at others—fur coats, children's toys, fuels for heating, and ice immediately come to mind—and provisions must be made for these peaks. This usually poses no great problem, since they recur regularly and can be anticipated with reasonable accuracy.

. Current Capital and the Business Cycle.—The fluctuations known as the business cycle present an extremely difficult problem in financing operations. These alternate periods of good and bad business which last from several months to several years seem to follow each other in a historical pattern that has led many observers to conclude that they are an inevitable feature of our modern complex industrial society.\ But no one has yet devised a way to forecast these irregular waves with any degree of accuracy. All we know is that economic activity seems to reach peaks of prosperity characterized by capacity production, high national income, full employment, good wages, high profits, increased dividends, and general economic well-being. Such periods call for more capital, both fixed and current. But somehow these peaks are unstable, and a reversal usually follows: prosperity leads to crisis, crisis to liquidation, liquidation to depression. Such periods are characterized by low volume of production, low national income, increasing unemployment, falling payrolls, losses instead of profits, and general economic distress. During such periods capital requirements are small.

Volumes have been written by economists about this leading economic problem of our times, but so far we have no sure-fire remedy, nor can we forecast at any moment of time where we are going cyclewise. We know that neither prosperity nor depression seems to last forever, and we know that once an upswing or downswing gets under way it tends to gather momentum; thus upward or downward movements tend to "feed upon themselves" until their course is stopped and reversed. Why they are reversed is a subject of considerable debate. Booms are said to come to an end for many reasons: because profitable new investment opportunities are inadequate, thus de-

creasing the demand for construction and heavy goods, creating unemployment, and reducing total payrolls and labor's buying power; because wants become satisfied and goods glut the market; because consumption falls off for lack of buying power or the credit-granting power of the banking system runs out and credit stringency results; because crops fail, or because they are too abundant and depress market prices. The turning point from depression to recovery, it is held, would be caused mainly by the opposite conditions.

Here we need not argue about the causes or the inevitability of cycles, nor even debate whether there is any such thing as the cycle. (Economists have "discovered" cycles lasting from three years to fifty years.) What is important to keep in mind is that the volume of business fluctuates within wide limits over a period of time; that neither the amplitude of the swings, their duration, nor their timing can be accurately predicted; and that these fluctuations greatly affect the management of a corporation's current capital.

One of the major factors in wise financial management is an appreciation on the part of the management of the extent to which the volume of a firm's operations, its net earnings, and its financial position is subject to the ups and downs of the business cycle. Some concerns are definitely in the prince-or-pauper class, enjoying high profits, peak operations, high employment, and high capital requirements in years of prosperity, and suffering from almost complete lack of business and a low volume of operations in times of business depression. On the other hand, there are many "depression-proof" or "depression-resistant" industries whose volume of business remains fairly stable through good years and bad.

As a rule, industries catering to consumer necessities or low-priced luxuries which are used up at once and which are sold at low unit prices enjoy steady sales even when incomes fall, unemployment increases, and business is depressed. Thus, bread bakeries, dairy companies, and manufacturers of cigarettes, chewing gum, matches, soap, paper, and other low-priced consumers' goods can look forward to stable operations and uniform capital requirements.) Of course, there are changes in capital

requirements that come with growth and expansion or are caused by inflationary price movements in the costs of raw materials, but a reasonably steady volume of business can generally be anticipated in these lines. Most public utility services fit into this pattern. People do not use much less water, electricity, or gas during depressions; these services are necessities for modern living and they are so inexpensive that consumption is never greatly curtailed. On the other hand, people may get along with fewer street car rides or give up their telephone service if they are out of a job for any length of time; hence these utility services are more cycle-sensitive. Gold mining moves contrary to the cycle since it has an unlimited market for its product at a price fixed by the government and its greatest threat is high costs, a factor more likely to be present in periods of prosperity than depression.

At the other extreme are the so-called heavy industries whose products are durable and are used by other producers rather than consumers. Since they are durable, their use can be stretched out over a long period of time, if necessary. Usually their products cost a great deal per unit. Industries producing these goods, or the materials necessary to produce these goods, go from the heights to the depths in cyclical behavior. For example, during a depression the market for heavy equipment virtually disappears, while in a period of prosperity the industry produces at full capacity and is often unable to keep pace with new orders. A brief glance at production statistics of capital goods, such as locomotives and railway equipment, industrial equipment, machine tools, farm machinery, automobiles, and trucks, is all that is needed to drive home that basic economic truth. Building activity, whether of factories, commercial buildings, or residences, follows the same wide swings, although special cycles of building have been identified as independent forces.

Likewise, the raw material industries serving heavy industry are cycle-sensitive.) The steel industry has always been considered one of our leading prince-or-pauper industries, and it has many counterparts. In depression years business volume can be as much as 50, or even 80, per cent below its best years, with

even wider swings in net earnings and with considerable variations in the need for current capital to finance operations.

Such is the background against which corporations must formulate and execute a policy of current capital management. In some corporations the problem is so simple as to require little more than routine control over the receipt and disbursement of funds. In others, a good deal of business acumen, foresight, and astuteness must be exercised.

Permanent and Temporary Current Capital.—Before considering the sources from which current capital should be obtained, it is important to distinguish between permanent and temporary current capital requirements. (Permanent requirements are those which are fixed by the irreducible minimum of cash, inventories, and receivables needed to carry on the normal operations of a particular business. This capital should be considered a permanent commitment which is no more withdrawable than is plant or machinery.' It is necessary to a going concern. It should not be treated as a fund of assets that can be liquidated at the end of a particular production cycle, season, or boom in order to repay creditors, expand plant, pay dividends, or to fulfill any other purpose for which cash might be used. \ In these respects it is to be sharply distinguished from temporary current capital, which is needed to carry on the business in times of expanded activity of a cyclical or seasonal nature. When operations return to a normal level these additional funds are no longer needed.)

Permanent capital should be obtained by some means that does not contemplate repayment within a short time.) In the case of a new business, current capital should be considered as part and parcel of the permanent over-all cash requirements to be raised by the sale of stocks or long-term bonds. Short-term borrowing from commercial banks should not be attempted for this purpose, since the loan is neither self-liquidating nor liquid as long as the concern remains in business. In deciding whether to finance these permanent requirements by issues of bonds, preferred stocks, or common stocks, consideration must be given to the factors discussed previously in formulating the financial

plan.) Obviously, a corporation is in a sounder financial position if it can raise both fixed and normal working capital by selling stock rather than by issuing bonds, but the costs of stock financing may be much greater. Moreover, a corporation facing variable current capital requirements will find it desirable to conserve part of its borrowing power for peak operations by issuing a maximum of stock and a minimum of bonds.

Sometimes it may be possible to depend upon "friendly" short-term creditors for some of the basic current capital requirements. Thus many retail merchants expect to buy part of their base stock of merchandise on credit from wholesalers. Where this is possible, the concern may always be from twenty to sixty days behind in its payments, so that year in and year out the merchandise creditors are in effect financing the concern. This is a reasonably safe practice, since the normal terms of credit and the desire of the wholesaler to keep his customer's patronage preclude the likelihood that immediate payment will be demanded.

In recent years term loans from banks, running from one to five years, have sometimes been negotiated for either fixed or current capital requirements; their repayment is expected not from shrinkage of the business or self-liquidation, but from the retention of profits and the accumulation of depreciation allowances. However, the necessity to repay in five years may be embarrassing if an adverse turn in events is encountered. Renewal is possible, of course, but only at the discretion of the banks.

Sources of Temporary Current Capital.—While sound practice restricts permanent current capital requirements to the issue of stocks or bonds for new business, or, for an established business, to these sources plus reinvested earnings and depreciation reserves, temporary capital requirements may be drawn from many sources. These variable requirements must not be confused with additional permanent requirements. Their distinguishing characteristic is that the need for them is temporary; their purpose is to meet a seasonal peak in operations or sales, to carry on expanded operations in the prosperity phase of the cycle,

to meet a temporary rise in commodity prices, or to provide the extra capital requirements that are thrust upon industries from time to time by such forces as war, crop failures or surpluses, and disruption of production or transportation.

The appropriate source of such temporary current capital will depend partly on the nature of the need and the predictability of its duration. It is easy to foresee the coming and going of seasonal peaks; it is harder to predict accurately the duration of the prosperity phase of the business cycle, and almost impossible to predict the duration and outcome of a major war or to chart the future course of commodity prices after a strong inflationary movement. These uncertainties harbor risks for short-term borrowing, which assumes that repayment can and will be made at a specific date in the future. The conservative rule should always he to avoid a legally enforceable debt obligation that is likely to come due before the means of payment are available. With these observations, let us examine the sources from which temporary current requirements can be met.

Permanent Sources of Temporary Capital.—Perhaps the safest way to provide enough capital to meet all temporary current requirements is from such long-term sources as security issues, retained earnings, or unexpended reserves. The trouble is that in most industries with highly variable capital needs it is not possible to forecast peak requirements with any degree of accuracy. If normal requirements are \$1 million, it is easy to understand that such factors as war, prosperous business, and inflation might boost requirements to \$5 million. The question then arises: Should the company raise \$5 million at the outset and keep it idle in the business in anticipation of some possible use at a future date? Such a policy is safe but not always economical. Idle capital is costly. The capital has been obtained by borrowing or selling stock or by reinvesting earnings, and the company pays interest or dividends for its use. Of course, the idle capital might be invested in off-peak times, but it must be kept in mind that the safest investments with the necessary liquidity yield very low returns; thus the search for higher yields is fraught with risks of loss of principal as well as of interest.

Idle capital encourages the temptation to speculate or to expand operations unwisely. A management skilled at converting steel into machinery, hogs into pork, or glamour into box-office receipts is not likely to be skilled in the art of safe and profitable short-term investment.

Trade Credit.—Perhaps the most widely used method of meeting the temporary, as well as some of the permanent, current capital requirements of a corporation is to obtain goods on credit. Although this method scems to solve the problem for the individual businessman, it actually passes the problem of financing to the firm from which he bought the goods. This firm may in turn buy materials on credit, and so on down the line, until someone must pay cash for the raw materials or the labor involved. Hence, somewhere in the process, current capital must be supplied. Perhaps the wholesaler or the manufacturer can sell on credit only by going to the bank for loans to finance his own operations, and so trade credit may ultimately resolve itself into bank borrowing or large permanent investments of capital by those selling goods.

Book credit is a flexible, adjustable source of capital; it is easy to negotiate and in times of stress it can be extended. The grantor of credit generally does not want to antagonize the borrower by pressing too hard for payment. This device seems to be without cost to the borrower, but it only *seems* that way. Usually, the cost of trade credit is hidden in the price of the goods or the terms of sale. Getting something for nothing is as uncommon in the economic as in the physical world.

The usual cost of trade or book credit is to be found in the terms of sale, particularly in cash discounts. If, for example, the terms are "2 per cent in 10 days, net 60 days," the buyer who fails to take advantage of the discount pays 2 per cent of the cost of the goods for 50 days' credit extension, or the equivalent of an interest rate about 14 per cent a year. Of course, this assumes that the buyer pays promptly at the end of 60 days, which is not always the case. Despite its costliness, trade credit still remains the most widely used source of current capital for most business concerns.

Commercial Banks.—Commercial banks are probably the most important direct and indirect sources of variable current capital. Their main functions are to accept demand deposits and to lend money to those who wish to borrow.) These loans are usually for short-term, self-liquidating purposes. Recent banking legislation, however, has broadened the lending range of banks, and the term loan, even for fixed capital purposes, and the mortgage loan have become legal and respectable in commercial banking circles. There are many reasons for these changes: the "easy money" policies of the Roosevelt administration in the 1930's, the desire to "reflate" prices and incomes through liberal bank credit, and the scorn for old-fashioned "conservative" notions about the proper field for commercial bank loans—especially the notion that loans should or could be self-liquidating—were among the contributing forces. The result was a series of laws which relaxed or removed loan restrictions for national banks.

These changes were not unwelcome to the bankers themselves. During the period of easy stock flotations in the late 1920's and the restricted demand for current capital in the depressed 1930's commercial bank loans declined in relative importance. To meet operating expenses, bankers used idle funds to purchase securities (mostly government bonds, but some corporate bonds as well) and by the end of the 1930's they had become more "merchants of debt" than grantors of commercial credit. Back in 1929, their loans were two and a half times as large as their bond investments; by 1939, their loans had been halved and their investments doubled. With the advent of World War II, bank holdings of bonds were greatly increased as the government borrowed from commercial banks funds that it could not raise by taxation or by sales of bonds to nonbank investors. Commercial banks in 1947 held about \$70 billion of government securities, as compared with \$16 billion at the end of 1939.

The postwar boom and inflationary rise in commodity prices caused businessmen once more to borrow heavily from commercial banks—a condition reminiscent of the years 1917-20 but on a more moderate scale—but even then bank loans still amounted

to less than half of total investments held by commercial banks. In 1947 it was reported that all insured commercial banks held \$69 billion of government securities and \$8 billion of other securities as compared with \$33 billion of loans, including \$8 billion of real estate loans, \$5 billion of consumer loans, and only \$15 billion of strictly commercial loans.

Our commercial banking system has changed its nature in the past two decades, but it is still a ready source of commercial loans when and if qualified borrowers present themselves. By and large, bankers would rather grant loans to business than buy government bonds because the yield of the former is larger, and they have sold government bonds at stabilized prices when they needed additional funds to increase their loans to businessmen.

What kind of a loan should the borrower seek from the bank? There are many variations, but basic to all loans is the establishment of sound relationships, for the commercial bank is still the heart of our system of business credit. Naturally, a firm would tend to prefer a local bank which has an alert and capable management, which is large enough to grant a sizable loan and about whose reliability and strength there is no doubt. Larger corporations may have banking connections with several banks, occasionally in different localities, to meet their requirements or convenience. Ordinarily a bank will limit the amount it will loan to one customer. Prudence counsels against "putting all the eggs in one basket" and the national banking law restricts one firm's borrowing to an amount equal to 10 per cent of the bank's unimpaired capital and surplus. This limit does not apply to the discount of drafts or bills of exchange "drawn in good faith against actually existing values," bankers' acceptances, two-name commercial paper, or paper secured by goods being shipped, all of which have no limit. Banks may also lend additional amounts equal to 15 per cent (or sometimes more) of capital and surplus on such security as government obligations, livestock, title to staple commodities, or indorsed notes which mature in six months.

Having established relations with a bank, the corporation

¹ Federal Reserve Bulletin, December, 1947, pp. 1510-1512.

may well inquire about a "line of credit," not necessarily because it wishes to borrow immediately, but because it is always desirable to know beforehand whether credit is available in case of need and in what amounts.\ Although it takes time, a bank's credit department should make a thorough analysis of a corporation's financial condition and keep this analysis up to date. It is essential in dealing with other business concerns that a credit reference at the bank be available. After an investigation involving a careful analysis of the nature of the business, its prospects, its risks, its size, the character and ability of its management, its financial records (including earnings statements and balance sheets), credit and trade references, and any other pertinent information, the bank will establish a "line of credit," which is simply an indication of the maximum amount that it would be willing to lend the concern at any time. This is not necessarily immutable—it might be modified by such matters as collateral pledged, changed business outlook, and changed management—but it indicates to the corporation the most it can hope to borrow from that bank. To keep the line "open," the corporation must keep the bank informed of its operations and financial condition, and must usually agree to conduct its banking business (i.e., keep a deposit account) with the bank from which it borrows.

When and if a loan is needed, the corporation management calls upon the bank and the loan is arranged. If the firm's credit is strong and the loan is small, it will probably borrow on its unsecured promissory note. Sometimes collateral may be pledged to obtain a more favorable rate of interest. This may take the form of marketable securities owned by the corporation (although they are usually sold rather than borrowed upon), or, in some types of business, title to goods in transit or in storage is commonly used as collateral. It does not take many carloads of sugar, wheat, rubber, tobacco, cotton, or butter to tie up large amounts of capital. Those dealing in these commodities frequently borrow upon an order bill of lading, under which a railroad or steamship company acknowledges receipt of the commodity and agrees to transport it and surrender the commodity to the person presenting the bill of lading.

A warehouse receipt is much the same in legal character, except that it represents commodities in storage rather than in transit. Staple goods are frequently shipped subject to a draft or bill of exchange, and the shipper who wishes to borrow will sell (discount) the draft and document rather than borrow on a promissory note secured by the document. Upon arrival, the draft is presented by a correspondent bank to the buyer of the goods who must pay the draft or "accept" it (by writing "accepted" and the date across its face and signing his name) before the bank will give him the bill of lading and let him receive the goods from the carrier.

Occasionally, concerns such as retail stores that are hard-pressed for funds will pledge their accounts receivable as security for a bank loan. For a long time this was considered a "last resort" type of loan, and was not encouraged by commercial banks, which preferred not to take the risks or the trouble involved. Recently, however, many banks, in search of profitable employment for their funds, have sought to attract this type of loan rather than divert it to a finance company or discount house. Arrangements are usually made so that the debtor will, as usual, pay the creditor and have no knowledge that his account has been used as collateral for a bank loan.

Borrowing on receivables is facilitated if the debt is evidenced by a promissory note rather than an open book account. The note, when indorsed by the firm borrowing from the bank, becomes two-name paper, that is, it also becomes the obligation of the indorser. Moreover, it is a definite promise to pay at a specific date rather than just a memorandum on the records of the creditor, which in the event of a dispute would have to be proved in court. This definiteness and superior legal standing would seem to make a note receivable so superior to an account receivable that the former would displace the latter in any competition of merit. But such is not the case. While in some instances the customer expects to give a promissory note at the time he makes a purchase—as when a farmer buys machinery it is much more common to record the debt as an open book account. The buyer then pays or is "carried" until the seller loses patience and presses for a settlement. Frequently the

debtor then gives a note for the open book account, but that note evidences a slow or uncollectible account and is therefore not very useful as a device for borrowing from a bank. Promissory notes so often represent heroic efforts to salvage something from slow or dubious open book accounts that this type of paper is only as good as the credit of the indorser.

Trade and Bank Acceptances.—In some transactions goods are sold on definite credit terms through the use of drafts and bills of exchange, which are instruments drawn by the seller of goods on the buyer of the goods (trade acceptance) or on the buyer's bank (bank acceptance) if the bank so instructs in a letter of credit. If it is payable "at sight," the buyer or his bank must pay when the draft is presented; if it is a time draft, the date of maturity is indicated or can be readily determined. Bills of exchange are usually thought to represent self-liquidating transactions. So highly are they regarded as a device for bringing definiteness and order into commercial credit transactions that for many years there has been what might aptly be called a "crusade" to dethrone the open book account and replace it by the acceptance. Our banking laws favor this type of doublename paper by exempting it from the limits imposed upon the amount a bank can lend to a single borrower. Lending banks may charge lower discount rates than on promissory notes, and Federal Reserve Banks usually purchase bankers' acceptances in the open market at lower rates and show other preferences for this type of two-name paper.

Yet acceptances are still confined to a small segment of domestic trade. Only in foreign trade is the acceptance the usual means of organizing mercantile credit. In that field it is virtually necessary, since the credit of the foreign buyer of the goods is not easily known to the seller or the seller's bank; hence a stronger credit instrument arises where the foreign bank, under a letter of credit, is substituted for the buyer of the goods. Moreover, the amounts involved in foreign shipments, the time-consuming distances, and the problem of exchange rates make the "regularization" of credit and a strict definition of terms imperative. It is customary for exporters to finance their opera-

tions by selling to commercial banks or bill brokers the bills of exchange arising from their sales. Moreover, buyers of goods fully expect to pay through the use of the bill of exchange, and the practice is now sanctioned by custom.

In domestic sales, however, the "crusade" has largely failed. Except for large shipments or the storage of staple goods, the draft is little used except as a device to collect "stale" accounts. All the favors bestowed upon the acceptance by our banking laws and practices have not been able to overcome the advantages of the open book account. The draft and promissory note are associated with bad debts and poor credit in the minds of most merchants, and rightly or wrongly they feel uncomfortable (if not insulted) when asked to obligate themselves under these forms. As a result, bank borrowing by businessmen on their own unsecured promissory notes, rather than on the discount of acceptances or the pledge of receivables, is the typical practice. The banker places more emphasis upon the substance than the form; upon character, capacity, and collateral (the three C's of credit); that is, upon the willingness and ability of the borrower to repay the loan than upon the particular instruments through which he borrows.

Multiple Bank Borrowing.—Occasionally, larger corporations will find it desirable to borrow in several communities, that is, tap the credit resources of several banks. This might be done for several reasons: (1) the firm's credit needs might exceed the loan limits imposed upon the local bank by law or by ordinary banking prudence; (2) the risk may be such that it ought to be widely spread; (3) local credit shortages may coincide with credit abundance in other areas; (4) local interest rates may be higher than those in other centers; or (5) the firm may wish to preserve part of its local line of credit to meet unforeseen contingencies.

The arrangements for such accommodations would vary. A large firm with nation-wide operations, like the American Telephone and Telegraph Company or General Motors Corporation, must establish many banking connections in the ordinary course

of their business. Multiple borrowing is therefore made relatively easy and natural.

When the securities markets are not overly receptive to new issues of common stocks, as in recent years, or where a corporation wishes to avoid the costs and liabilities involved in the public flotation of bonds, or where temporary financing is required, it is fairly common to arrange a line of credit with several banks. Thus the Consolidated Edison Company of New York, in December, 1947, arranged a \$70 million credit for construction with fifteen New York banks. This practice was widespread during World War II when many corporations were faced with huge war orders and the necessity of financing a multiplied volume of production. So-called Victory loans, backed by government orders or a government guaranty, were negotiated with banks, and the credit needs were met. Even before the war, the term loan, repayable in installments, had been resorted to for intermediate as well as short-term credit needs. Banks seeking profitable uses for their funds welcomed them, and corporations found them adequate, convenient, and economical. Most of these loans were negotiated with individual banks, but it was not uncommon for more than one bank to extend the credit. With the expanded volume of operations and higher price level after World War II, the need for credit increased greatly. Larger inventories and receivables, new equipment, and plant expansion all called for more capital, and commercial banks, singly or in groups, answered the requests for both current and fixed capital with a sharply expanding volume of loans and discounts in 1946 and 1947. This credit made possible the expansion of individual firms and contributed to the "capital goods boom" and commodity price inflation of those years.

Commercial Páper.—Of longer standing is the practice by which corporations, in effect, borrow from banks in financial centers no matter where they are located. This is done by issuing commercial paper and selling it through a specialized middleman called a "note broker," who receives a commission for finding buyers for the paper, or through the "commercial paper house," which buys the paper outright and resells it to commer-

cial banks. For this it receives a commission of ½ to ½ per cent. The paper consists of promissory notes issued in round denominations (\$10,000 or so) and indorsed by the borrowing corporation. This makes it easily negotiable without indorsement and guaranty by the commercial paper house. The notes mature in about six months and must be paid promptly, since the buying bank has no feeling of responsibility for the welfare of the borrowing corporation. The notes are sold at a discount which depends partly upon the going rate for such "open market commercial paper" and partly upon the credit standing of the issuer. Discount is earned by the commercial paper house during the period of distribution, but the latter commonly has to borrow from a commercial bank with the notes as collateral in order to pay the issuing corporations promptly.

Although the advantages and disadvantages of issuing commercial paper have long been debated, no universally accepted conclusions have been reached. In the first place, the practice is limited to large concerns, whose earnings and working capital positions are strong and whose credit standings are well known and kept impregnable by prompt payment of their debts. Secondly, any savings in interest charges may be negligible because the sales commission of 1/4 per cent for three months is equivalent to 1 per cent a year. Thirdly, it is contended that a firm is likely to overborrow, since it can get larger aggregate loans this way; that is, it can both borrow from banks and sell commercial paper and so overcome credit limits imposed by banking prudence. This, of course, assumes that banks that loan directly and banks that buy commercial paper are careless or deceived, neither of which is likely. Careful attention to limits of prudence (not necessarily individual bank legal limits) are just as necessary and as likely to be observed in market borrowing as in direct borrowing.

The biggest disadvantage of open market borrowing may be that a firm that habitually issues commercial paper may lose the benefit of the guidance and advice its local banker can give. The firm is on its own and must take the consequences of substituting its judgment for the banker's, and of having no particular bank that feels the slightest responsibility for "seeing it through" a

difficult period. Whether these are real drawbacks depends upon the wisdom, independent strength, self-restraint, and business stability of the borrowing corporation. Those which do not have it might be better off to tie up with a sound local bank. Others can safely seek the economies (if any) of borrowing from the credit resources of a wider geographical area.

In practice, the use of commercial paper has been quite limited. It was popular during the prosperous 1920's, especially before corporations took advantage of rising stock prices to obtain current capital from this more permanent source. But even then, estimates put the total volume of commercial paper at less \$1 billion. With the business recession during the 1930's, when local banks actively sought to make loans at low interest rates and when corporations were rather well supplied with current capital from stock sales in the 1920's the volume of commercial paper remained at low levels. Whether corporations will again resort to this sort of borrowing on a large scale cannot now be determined. The present large credit resources of our banks, their willingness to grant loans—even unorthodox ones—and the possibly greater equalization of interest rates in various commercial centers have lessened the need to use commercial paper.

Other Credit Sources.—The discussion of the sources of business credit would not be complete without at least a brief description of the way in which specialized credit institutions help to provide part of our needed credit. Many of these sources ultimately depend upon the capital markets or commercial banks for funds, but they relieve manufacturers and dealers of the necessity of providing the credit.

Factoring.—Factoring involves the outright purchase of accounts receivable by the factor, who also takes the risk of non-payment of the debt. Originally confined largely to the textile industry where their lineage is traced back to the "cloth factor" of the Middle Ages, these houses specialized in selling cloth for textile mills, assuring them payment for goods sold on credit, and advancing money to the mills until the credits came due. With the passage of time, the selling function was gradually taken over by "selling agents" who were frequently but not

necessarily associated with the mills. Since the goods were sold to many small manufacturers or distributors, the problem of credit risks was important. Where the mills were unwilling to carry the accounts themselves the factor continued to assume this risk, since he had expert knowledge of the credit standing of textile buyers.

For his services the factor makes two charges: a fee of up to 1 or 2 per cent for buying the accounts and assuming the credit risk, and a charge of about 6 per cent a year on any cash actually advanced to the seller of the goods. This source is, of course, more costly than credit from the commercial bank, but it involves a transfer of risk to the factor, who must be paid for investigating and assuming the credit risk. For these charges a textile firm's business, in effect, is placed on a cash basis. Moreover, the factor will frequently lend money where a bank would refuse the loan as risky or excessive.

In the course of time, factoring services have been extended to other fields, among them leather, furs, lumber, and petroleum products. In addition, imports of textiles, clothing, shoes, candy, and other products have been factored in the same way. The volume of factoring is estimated to run well over \$1 billion a year. The factor obtains his funds by borrowing from commercial banks or by selling securities to the public, to supplement the capital invested by the owner. To protect against unwise credit risks the factor may decline to buy accounts of buyers he considers untrustworthy.

Finance Companies.—In addition to factors, there are many credit companies specializing in particular types of loans. The automobile industry gave birth to the automobile installment credit company, many of which have extended their operations into other areas where goods such as household appliances are sold to consumers on the installment plan. These companies arose because the banks at first avoided this type of loan. "Consumption" loans were thought to be much more risky than loans for production, especially when such luxury items were purchased. Moreover, banks did not have the facilities for collecting and servicing these loans, or repossessing equipment when

debtors defaulted; these activities were foreign to the traditions and dignity of banking. Finally, many of the early loans carried high (almost usurious) rates of interest.

Eventually the loss experience of the finance companies proved that these loans were not excessively risky, and in recent years many banks have tried to lure installment loans away from specialized finance companies. Two of these companies—C.I.T. Financial Corporation and Commercial Credit Company—have, by growth and consolidation, become very large and consistently profitable. Both have gradually broadened their fields of activity and now include in their activities loans on accounts receivable and factoring.

Since installment loans are usually made to consumers, the dealer and manufacturer are relieved of the necessity of financing a huge volume of receivables. The typical retail installment transaction involves a down payment by the buyer, and the signing of a contract to pay a certain amount each month until the principal, along with interest, insurance, and other charges, has been fully paid. The seller of the goods, wishing to have cash to finance his business, sells the installment sales contract to a finance company which advances the cash and collects from the purchaser. At one time, the dealers handling one make of automobile or equipment sold all of their paper to one finance company, either affiliated with the company (as the General Motors Acceptance Corporation) or independent of it (as the Commercial Credit Company and Chrysler Corporation). However, these exclusive arrangements have run afoul of the antitrust laws and have had to be modified or abandoned.

Finance companies obtain a substantial part of their funds through the sale of common and preferred stock and through reinvested earnings. They have also issued bonds, but depend much more heavily on bank borrowing. They are large, direct borrowers from banks and also sell their promissory notes in the open market.

Finance companies sometimes make loans to dealers on the security of the equipment before it is sold. This is known as a "wholesale" loan and it is paid off when the sale is made for cash or for "retail installment paper."

Usually the finance company takes the risks of loss through nonpayment, but in some cases the dealer must indorse the paper or agree to repurchase the equipment and so make good all or part of the loss through default and repossession.

Because of these specialized institutions, the automobile and appliance manufacturers and distributors are able to avoid the responsibility of financing the huge volume of receivables that the sale of their products entails, thus greatly reducing their need for current capital.

Government Institutions.—Space does not permit a detailed account of all the special lending institutions set up by the federal government—especially during World War II—to supply fixed and current capital. Although over thirty federal and federally sponsored agencies make loans, the principal lending agency is the Reconstruction Finance Corporation, which was originally established in 1932 to make relief loans to banks, railroads, and municipalities from federal funds, part of which were subscribed as capital, but most of which were borrowed from the United States Treasury. With the advent of the New Deal and World War II, new tasks were assigned to the R.F.C. and its progeny. In the period 1932-46, the R.F.C. made loans amounting to nearly \$31 billion, and all but \$1.5 billion has been repaid. About \$22 billion of these loans were made for war purposes. Of special interest here are its loans for business purposes. Under the law the R.F.C. may make loans to solvent business concerns which cannot obtain bank credit. At the end of 1946 it had actually made \$525 million of these loans of which \$357 million had been repaid.

Another source of business loans was opened up by Congress in 1934 when it authorized the Federal Reserve Banks to make loans to "deserving" firms who could not borrow from banks. At that time, the banks, which had been severely criticized for their lack of caution in the 1920's, were chided for being too timid and conservative in their loan practices, so the government opened the Federal Reserve Banks (which previously made loans only to banks) to business concerns for loans up to five years in

duration. These loans have not been an important factor in the total volume of business credit.

During World War II and after, the United States Treasury guaranteed private bank loans to 9,000 war contractors, aggregating over \$10 billion. Since these were based upon government contracts, the usual economic risks were absent. At the termination of the program it was reported that losses had been kept to a minimum—about \$7 million—and that after paying \$5 million to the Federal Reserve Banks to cover the expenses of administering the program, the Treasury had made a net profit of \$23 million from guaranty fees and interest.

REFERENCES FOR FURTHER READING

Abbott, C. C. Financing Business During the Transition. (New York: McGraw-Hill Book Co., Inc., 1946), Chs. 3-6.

Bogen, J. I., ed. Financial Handbook, 3rd ed. (New York: The Ronald Press Co., 1948), Secs. 16-18.

Burtchett, F. F. Corporation Finance. (New York: Harper & Bros., 1934), Chs. 18, 30, 34, 36.

Dewing, A. S. Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book III, Chs. 7, 8.

Greef, A. O. The Commercial Paper House in the United States. (Cambridge: Harvard University Press, 1938).

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Chs. 18-20.

Lincoln, E. E. Applied Business Finance, 5th ed. (New York: McGraw-Hill Book Co., Inc., 1941), Chs. 14-18.

Saulnier, R. J., and Jacoby, N. H. Accounts Receivable Financing. (New York: National Bureau of Economic Research, Inc., 1942).

Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century Co., Inc., 1942), Chs. 17, 18.

Temporary National Economic Committee. Monograph No. 15, Financial Characteristics of American Manufacturing Corporations; Monograph No. 17, Problems of Small Business (Washington, 1941).

Chapter 13

DIVIDEND POLICY

One of the crucial matters affecting the current capital position is the payment of dividends. Should dividends be paid, and if so what form should they take? Corporate managements are normally conscious of the desire of stockholders for dividends. It is not too much to say that the hope of dividends and of capital gains, a desire closely associated with dividends, is the major purpose of stock investment. To make profit is the purpose of all economic activity, individual or corporate, and to the average stockholder profits must be translated into forms that will have meaning and substance. Yet it is a cardinal principle of sound financial practice, as well as of law, that the mere recording of net income to the stock equity in a given accounting period does not automatically entitle the stockholder to a dividend. Dividends are usually paid in cash, and the cash may be needed in the business. Hence, the board of directors must reconcile the wishes of the stockholders for immediate dividends with the financial needs of the corporation and its long-run interests. In a sense the management decides for the stockholder whether it is wise to have dividends now or forego dividends for the present in the hope of larger dividends later on. It is essentially a matter of good business judgment, although sometimes considerations of law and taxation are also involved.

What are the factors to be considered by management in deciding whether or not dividends should be paid, and if so what the amount should be? For the moment, we will assume that the dividends are to be paid in cash.

Earnings.—One of the most important considerations in American corporate practice is whether or not the business has operated profitably in the current or preceding accounting period. While nothing in the law or even in the precepts of sound finance requires a close gearing of dividends to earnings, it is an "unwritten law" among corporate managements that when earnings fall or disappear, dividends are cut or suspended entirely, even though the corporation has ample earned surplus on the balance sheet from previous years' undistributed profits and even though there are generous amounts of cash or other liquid assets in the treasury. To be sure, a company like the American Telephone and Telegraph Company, with its 750,000 stockholders, has established a unique record of maintaining its \$9 a share dividend since 1921, even though it meant "dipping into surplus" to the extent of from \$.25 to \$2.48 a share in depression years like 1932, 1933, 1934, 1935, and 1938, or in the war years when taxes and inflated costs, with stable rates for its service, brought earnings slightly below the \$9 dividend requirement. But this is the "exception that proves the rule" and ordinarily corporations keep dividend payments well below reported earnings.

Even though earnings available to the stock equity are determined by a series of accounting approximations, there seems to be a kind of finality about the reported earnings per share. brought down to the last penny. An alert management will be concerned about the accounting methods used to determine net profit, not because of its interest in the disputed points of accounting theory, but because of the importance of knowing whether the earnings are conservatively stated or not. One of the questions that will arise is the adequacy of all charges against gross revenues or sales. Ordinarily the amounts paid out for labor, material, and taxes are definitely ascertainable, but other costs are subject to human judgment.) An important aspect in the interpretation of the earnings statement of a railroad, for example, is the adequacy of the "maintenance of way and structures" and "maintenance of equipment" expenditures. These constitute a large part of the cost of operating a railroad and can in considerable measure be postponed or anticipated. The property may be built up or become run down because of changing maintenance expenditures, and therefore earnings may be understated or overstated. The same thing is true of utility companies and, to a lesser extent, of manufacturing corporations.

Depreciation and Obsolescence.—Closely allied with the problem of adequate maintenance are the costs of depreciation and obsolescence. These charges against earnings are made in recognition of the gradual physical or economic deterioration of property which will some day have to be replaced. Machines. buildings, rolling stock, fixtures, and virtually all man-made wealth, no matter how well maintained, wear out or become outmoded, inadequate, or economically worthless because of invention, growth, or change. (It is standard accounting practice to charge the cost of such equipment in yearly installments, as a part of the expenses of production during the years that the asset is being used up. This is usually done by the straight-line method. which prorates the cost of the asset equally over the years of its life. Other methods are sometimes used. One method charges greater depreciation in earlier years when maintenance is less; another method charges a lower depreciation rate in earlier years because the amounts set aside will accumulate at compound interest for a longer time until the asset is replaced. This is known as the sinking fund method. In some cases the rate of depreciation is held to be closely associated with the rate of operations and charges are made on the basis of the volume of production, hours of utilization, or sometimes even on gross revenues or sales.) While plausible arguments can be advanced for the use of any of these alternative methods, it must be recognized that estimating the life—either physical or economic—of a particular asset is not an exact science. The straight-line method, which is less likely to be subject to arbitrary or manipulative practices, is on the whole preferable to overrefined or discretionary methods of depreciation accounting.

Some corporations do not follow standard procedures of depreciation accounting at all. Instead of making a charge for the depreciation or obsolescence of physical property, they contend that the property can be kept intact by proper maintenance. After a concern has hit its stride, the replacement of units that wear out can be charged against earnings in the year of replacement. Since the properties of corporations consist of many individual items, it is argued, replacements will tend to even out over the years, and it is proper to make the charge when replacement actually takes place. Under this method the company does not have to guess the probable useful life of each item, or to build up reserves for depreciation that will never, in fact, be used because the property will never be restored to a completely new condition. (The only reserve set up by this retirement method of accounting is one to equalize year-to-year retirement costs, particularly of large and costly items.) This method was first advocated and staunchly defended by some public utilities, which did not build up depreciation reserves on a straight-line basis. In this they were opposed by state regulatory commissions, the Federal Power Commission, and, more recently, by the Securities and Exchange Commission. The argument has been won by the regulatory authorities, and utilities have revised their accounting practices to conform with the straight-line basis, not only in accounting for earnings, but also in writing down property valuations or setting up increased valuation reserves on the balance sheets. In many cases, this has seriously affected a company's balance sheet, sometimes wiping out part or all of the surplus accounts, or even necessitating a write-down in the capital stock account.

Another major exception to the use of straight-line accounting has been found among railroads. For years they followed no consistent policy of depreciation accounting, depending largely upon maintenance and retirement accounting to keep their physical property intact. Although the Interstate Commerce Commission was given the power in 1887 to prescribe a uniform system of accounts for railroads, it was not given the authority to prescribe depreciation charges until the passage of the Transportation Act of 1920. The commission found that railroads were in fact following the most diverse depreciation practices, and in 1926 prescribed rules applying to all depreciable property. However, under protest from the carriers, the rules were reconsidered, modified in 1931, and became effective for all property except road structures in 1935. Depreciation accounting for road structures went into effect in 1943.

. It should be clear that depreciation accounting is of major influence in the determination of the net earnings of corporations with large investments in depreciable assets relative to the volume

of business—in other words, companies with a low capital turnover. It is obvious that if a railroad or public utility has four or five dollars of depreciable property for each dollar of gross revenues, a small variation in the percentage charged for depreciation can make a large difference in net earnings. Contrariwise, a merchandising concern which has only one dollar of investment (mostly in current assets) for each six dollars of sales will find depreciation charges on its property an almost infinitesimal part of the cost of operations, and large variations will make only small changes in the stockholders' net incomes. In this case depreciation accounting policy is not very important. Somewhere between these extremes lie the vast majority of our manufacturing concerns.

Closely allied with the problem of the method of depreciation accounting is the base upon which it is charged. Accepted accounting practice and the uniform policies of regulatory commissions in this respect are to base the charge on the actual cost at the time the asset is acquired. Since regulatory commissions commonly use the original cost of the property (or "prudent investment" in it) as a rate base to determine reasonable charges to customers, it is to be expected that depreciation charges be consistent. Courts have upheld the original cost basis of depreciation charges, although the Supreme Court, in *United Railways v. West*, 280 U.S. 234 (1930), seemed to favor "present value" rather than original cost. The view in the West case has since been reversed.

But what of the average nonregulated corporation, especially in times when the cost of replacing buildings, machinery and other depreciable assets is falling rapidly, as in the depression of the 1930's, or rising steeply, as in the post-World War II inflationary boom? Are earnings reported accurately if equipment costing \$100,000 in 1938 and depreciated at the rate of \$10,000 a year has to be replaced ten years later at a cost of \$170,000? Should not depreciation charges be based on replacement cost rather than original cost? That question has been raised in recent years by nearly every corporation president in his annual stockholders' report. Corporations in 1947 reported large net profits (after taxes) amounting to about \$17 billion. Yet many

of them were short of cash, and some had borrowed heavily from banks. Why? For many reasons, but partly because these earnings were not disposable earnings at all. In the example above, to keep the plant physically intact by replacing the identical machines, it was necessary to provide \$70,000 more than had been charged in depreciation. Should this be considered an unrecognized expense or an added capital investment? /Ordinarily it is considered the latter on the ground that charges for depreciation and obsolescence have as their most important function the preservation of the integrity of a sum of money representing the original investment, not the preservation of specific physical property. It is obvious that this theory has its limitations, but the adoption of replacement cost as a basis would bring almost complete confusion to the accounting records. The ups and downs in plant and equipment costs would so modify accounting charges in periods of active inflation or deflation as to distort the picture of current earnings, and make changes in capital values the major determinant of income. If replacement cost could be foretold ten years or so ahead of time, this change in value could be anticipated and gradually provided for. Unfortunately, no one can predict price levels, business conditions, or equipment costs even a year in advance.) Any attempt to do so would introduce another "guess"-probably of little validity -into the accounting process. (Perhaps the recovery of the actual cost—a definite nonfluctuating amount—is about all that can be expected of accounting for depreciation or obsolescence, and this limited role should be recognized.) It should also be realized that the net earnings as reported are not necessarily disposable earnings, available for dividends.

(A somewhat different case is presented by charges made to recover the cost of an asset that is not expected to be replaced. Such a charge is known as depletion.) Here no problem of changing price levels is involved since the asset is to be exhausted and will not be replaced. (Depletion charges are important principally in mining and petroleum industries where a charge to recover the cost is indicated, but dividends are commonly paid in excess of net earnings (after depletion). This is because the original investment should be returned to the stockholders,

since by the nature of the enterprise the assets will not be replaced. The law recognizes this by permitting dividends to be paid "out of capital" by such companies. Care should be taken to inform the stockholders what part of the dividend comes from earnings and what part from capital. Sometimes, a corporation with exhaustible resources will try to offset depletion by the acquisition of new resources. Thus, an oil company may develop or buy newly developed wells and so maintain its productive capacity. If the cost of the new resources varies from the cost of the property exhausted, the question of original versus present cost arises. Since, in this instance, provision must be made for replacement of assets, a smaller amount of funds is available for the payment of dividends.

One final word of caution is necessary for those who hold the belief that depreciation, obsolescence, and depreciation accounting, by making proper charges to operations and creating "reserves," automatically provides funds for asset replacement. This, of course, is false. Accounting consists only of the process of recording; it has nothing directly to do with the custody and management of cash or other assets. Charging operations with depreciation and creating a depreciation reserve do not affect the cash account. Strictly speaking, assets are replaced not from depreciation reserves but from cash. All that accounting does is to warn management that certain assets should be kept in the business and should not be distributed as dividends from fictitious earnings. The assets may consist of plant, inventory, receivables, cash, or any kind of property. There is no correlation between depreciation reserves and the amount of cash assets a firm may hold at any particular time.

Inventory Valuation.—The way in which inventories are handled will reveal to what extent operating results have been dominated by changes in the prices of raw materials or finished products and the resulting inventory gains and losses. The Department of Commerce estimated that in 1947 inflationary price movements gave rise to inventory profits of over \$4 billion and thus accounted for a significant part of the \$17 billion profits reported by all corporations. As every student of accounting

knows, the valuation of inventories is a prime factor in the determination of the cost of goods sold and therefore of earnings. If valued on the basis of cost when prices are rising, inventories on hand are carried at less than what it would cost to replace them. If their low actual cost, rather than high replacement cost, is charged against sales, a large profit will be shown; but this profit is purely nominal since the raw material will have to be repurchased at current high prices if the firm is to continue to operate. Thus, what seemed a profit is lost by inventory replacement. To avoid this kind of fictitious profit, many concerns have adopted the tast-in first-out (LIFO) method of inventory accounting. Under this method inventory profits in times of rising commodity prices and inventory losses in times of falling commodity prices are avoided, since operations are charged with the most recent purchases of materials. The cost of sales is increased in times of rising prices and reduced in times of falling prices. This method eliminates most of the inventory gains and losses, and makes the income statement reflect true operating results and not commodity price fluctuations.) Corporations in the meat-packing, tire and rubber, and metal-fabricating industries and in retail trade have gradually adopted LIFO as a device for minimizing earnings distortions due to inventory price fluctuations, and the Bureau of Internal Revenue has permitted LIFO to be used more widely in the computation of corporate income taxes.

Other Allowances.—In considering dividend policies, management will want to interpret reported earnings further. Not only will the adequacy of charges to maintain the integrity of the investment in physical property be considered, but similar charges to reflect losses of other kinds are pertinent. Thus, allowances for bad debts, for losses on foreign exchange, for the exhaustion of patents, copyrights, and franchises, or the writing down of good will might be highly significant to some companies.

Reserves and Surplus.—Two more accounting concepts are significant for dividend policies. One pertains to the common practice of making provision for various reserves in the compu-

tation of net earnings available to stockholders. The other has to do with surplus.

Reserves may be set up for many purposes. We have already seen how reserves for depreciation and obsolescence are provided for by charges to operations to cover physical or economic deterioration of the assets. Likewise, reserves might be provided to represent deterioration or losses on such assets as receivables or inventories. These are known as valuation reserves and are commonly carried on the balance sheet as deductions from the asset to which they relate. They represent definite losses in the value of that asset.

Another kind of reserve is set up to provide for an expense or loss that is virtually certain to occur, but whose amount is not definite. Thus, during World War II is was common for corporations to provide large reserves for such items as renegotiation and excess profits taxes under which the government recaptured large amounts of the profits made on war contracts. Until renegotiation proceedings were completed or tax returns reviewed, however, there was no certainty as to the exact amount of the liability. Such reserves are known as liability reserves, and the amounts set aside are not available for dividends.

The third kind of reserve involves neither certainty nor liability. It merely represents a possibility of an expense or loss which the directors wish specifically to provide for in advance. It is known as a contingency reserve. Since the contingency may or may not occur, it cannot be considered an expense. Contingency reserves are not allowable as deductions for corporate income tax purposes, and since they are often arbitrary and are not set up by all corporations, they are commonly considered to be part of stockholders' net earnings.) Thus, a corporation may set up reserves to cover possible losses in patent litigation or rate controversies, or to provide for losses on property or almost any contingency to which business flesh is heir. Other companies which may be subject to the same risks keep assets in the business to cover such possible needs, without setting up a special reserve for each class of contingency. Because these reserves partake of the nature of earnings kept in the business, they are commonly known as earmarked surplus or surplus reserves.

These reserves are set up from current earnings or accumulated surplus. When the need or contingency has passed, they are transferred back to earned surplus by a vote of the directors. Thus, many corporations which set up large reserves for reconversion and for postwar contingencies during World War II later found that part of such reserves was not needed and could be restored to surplus. In essence, these reserves are a reminder to management that certain portions of the surplus or net earnings are not available for distribution, but should be kept in the business for specific purposes.

In like manner, management might create special reserves for the expansion or improvement of property, for the increase of working capital, for dividend equalization, or for almost any other conceivable future use for which earnings are plowed back into the business. Usually, however, specific surplus appropriations are not made for these purposes. Management simply recognizes that these objectives can be accomplished only if assets are not depleted by dividend payments to the full extent of the reported earnings. In this, it observes clearly the elementary truth that there is nothing in accounting as such that can provide or conserve cash.

A final accounting concept with which management must deal in determining dividend policy is surplus itself. Essentially all classes of surplus (except paid-in surplus) arise from a growth in value of the assets above the amounts originally invested. The major growth is usually due to reinvested earnings, but surplus can be reduced or increased by any transaction which affects assets, liabilities, or capital stock.

In an accounting sense, the most important function of the surplus account is to keep the asset and liability sides of the balance sheet in balance. In the legal sense, its presence allows dividends to be paid, since dividends can be distributed only if total assets exceed the liabilities and the capital stock account. In the financial sense, surplus means little or nothing. It is not cash. It does not represent any specific asset. A corporation could have a million dollars of surplus and not a cent of cash, or vice versa. All this is elementary, but it needs to be reiterated. One frequently hears that corporations should do this, or do

that, because they have "huge surpluses." Presumably they are rich because the surplus accounts are large. Yet many corporations with large surpluses on their books have gone into bankruptcy. Moreover, if surplus meant riches or cash, how easy it would be to create some by merely writing down the capital stock or writing up the value of the assets! These create surplus, but they do not change the corporations' wealth one iota.

Only in the figurative sense do corporations pay dividends "out of surplus." Dividends are usually corporate distributions of assets to stockholders. Surplus has nothing to do with it except to indicate that there are assets in the business in excess of the liabilities and capital stock, and therefore the payment of dividends is legal. Surplus can arise from anything that reduces the liabilities while assets and capital stock remain the same, or reduces the capital stock while assets and liabilities remain the same, or increases the assets while liabilities and capital stock remain the same. Capital surplus may arise from the sale of assets at a profit, from repurchase of bonds at a discount, from upward valuation of assets, from a reduction of par or stated value of stock or a reverse split-up of stock, or from the sale of stock for more than par or stated value. However, these nonrecurring items are not important for dividend policy. Scarcely anything happens in the routine operation of a business that does not affect earned surplus, for like a mirror it reflects and summarizes the operating results of an accounting period. It is the change in earned surplus flowing from regular operations that indicates the health of the business and is a leading factor in dividend policy.

Reinvestment vs. Dividends.—Once the earnings statement has been properly interpreted, the problem of management is to reconcile the desires of the stockholders for dividends with the need to reinvest earnings for the protection and promotion of the business. Most American corporations have depended largely upon reinvested earnings to finance growth and development, and the rule of thumb of "a dollar back for a dollar of dividends" has expressed these sentiments. Yet practice has

varied widely and the proper policy for each corporation must be determined in light of the circumstances it faces.

Sometimes corporate management is in effect forced to reinvest earnings. If, for example, a given physical volume of business requires more capital (measured in dollars) to carry inventories and receivables because of an inflation of commodity prices, management is left without much freedom to act. When the time comes to consider the declaration of dividends, the directors find that price inflation has expanded the dollar volume of inventories and receivables, and drained away cash that might otherwise be available for dividends. This is the situation in which most corporations found themselves after World War II. Despite large accumulations of liquid assets and cash during the war, many companies were short of cash because of rising prices and expanded physical volume of sales. Hence, 1947 dividends amounted to only about 40 per cent of earnings rather than the 70 per cent that was typical in prewar years. Economic conditions rather than any decision involving fundamental dividend policies settled the matter.

Discretionary Reinvestment of Earnings.—Reinvestment of earnings often involves a conscious decision to forego dividends in order to use the cash for corporate purposes. These purposes may be varied.) One purpose is to provide funds for expansion. Plant additions, major improvements, the purchase of other plants and expansion of sales facilities are the normal course of corporate life if the firm is successful. (In the early years of a corporation's life expansion is usually financed out of earnings, since the capital markets are not receptive to small and unknown issues.) The tradition of American business that to be "bigger and better" is a sure way to success makes every concern expansion-minded. This attitude persists despite the evidence that expansion is frequently unprofitable and even disastrous. Economic development, business growth, and the reinvestment of earnings have gone hand in hand, and probably will continue to do so. (From a social point of view, reinvested earnings are the most dynamic capital we have, for they provide venture capital when all other sources fail.)

Earnings may also be reinvested to pay off debt (bank loans or bonds) or to retire senior capital in the form of preferred stock.) This is especially true of industrial corporations which usually depend upon earnings to retire debt obligations. Public utilities have small earnings relative to their debt, and depend more upon refunding than repayment of debt. Railroads also as a rule do not repay much of their debt through reinvestment of earnings, perhaps largely because of low earnings during the past twenty years. However, in recent years, they have made heroic strides in reducing debt, mainly by open market purchases of their bonds at a discount. They have plowed back most of their high wartime earnings instead of distributing them as dividends.

Sometimes, earnings are reinvested to build up assets so as to increase the equity of the stockholders and provide a larger margin of protection to bondholders. This has become a common requirement of the Securities and Exchange Commission where electric power companies have requested permission to issue bonds that would bring the bonded debt above 50 to 60 per cent of total capitalization. If permission is granted, dividend restrictions are almost certain to be imposed. In similar fashion, federal and state regulatory authorities sometimes restrict dividends to build up adequate reserves for depreciation where properties have been overvalued on the books of utilities or where inadequate provisions have been made for depreciation.

Another powerful motive for the reinvestment of earnings is that of business prudence. Even though no specific plans of expansion or debt repayment are envisaged, it is not considered conservative business policy to pay all the earnings as dividends, except in mining and other wasting-asset industries. Perhaps this attitude that "a business cannot have too much cash in this uncertain world" is a sound one, but it can lead to ridiculous extremes. Cash hoarding by corporations does no one good, and excess cash may be an open invitation to unwise expansion or speculation. Management must realize that it is not the owner of the cash, but a trustee of it for the stockholder's benefit. There is a strong presumption that cash should be distributed

if it cannot be profitably employed in the firm's regular operations.

Of course allowance must be made for contingencies that cannot be precisely predicted but all too frequently occur. A severe depression, inability to market securities, a series of business reverses, losses due to uninsurable risks, the cost of new product development, and a host of other reasons for caution and conservatism appear. That is particularly true when the industry is sensitive to fluctuating business conditions. Here greater precautions must be taken, and stockholders must reconcile themselves to receiving a smaller proportion of earnings in good years and a greater reduction of dividends in poor years. In the severe depression of 1932, leading companies in cyclesensitive industries like farm machinery, auto parts, and railroads reduced their dividends on common stock by 80 per cent or more, while oil companies cut their dividends only in half, and tobacco companies actually increased their dividends by one fourth.

These familiar dividend patterns are well known, and here again the business cycle becomes a determining force in another phase of financial policy. Despite the accumulation of earnings in good years, it is uncommon for managements in cycle-sensitive industries to continue substantial dividend distributions when earnings drop and the business weather becomes threatening. This is considered a sound policy because it is "conservative," but the stockholder usually opposes it because of its effect upon his income and because of the resulting decline in the market value of the stock. The notion that dividends should be stopped immediately when earnings decline needs re-examination, although it is probably less harmful than a policy which goes to the opposite extreme.

Even if a corporation finds its capital requirements increasing, it might provide for them by marketing securities rather than by reinvesting earnings. The payment of dividends then comes to depend upon the state of the securities markets. If security prices are high and soundly undergirded by a strong and active demand, new stock and bond issues are readily absorbed at prices that are advantageous to the corporation.

Sometimes, bond prices are strong and stock prices weak, as in 1947, or vice versa, as in 1929. A strong bond market does little good to a corporation that needs equity capital rather than debt capital, and a strong general stock market does not help a corporation in a field whose stock prices are depressed, as textiles were in the late 1920's.

Dividend restrictions in the prosperous years 1946 and 1947 were no doubt made more severe by a relatively weak market for common and even preferred stocks. With inflation everywhere in evidence, common stock prices alone remained relatively deflated, and corporations in many cases found the cost of obtaining equity capital to be excessive. Estimates indicate that about 53 per cent of the 1946 and 1947 capital requirements of corporations were met from these internal sources, another 19 per cent from drawing on cash balances and government bonds, 14 per cent from bank loans, and only 14 per cent from new issues of stocks and bonds—mostly bonds and preferred stock. While these are only approximations, they indicate clearly why dividends lagged so far behind earnings in the immediate postwar period. Debt capital at an interest cost of 3 to 4 per cent was reasonably plentiful and the money market was easy for those concerns to whose capital structure bonded debt was appropriate. Sometimes, the entire money market is tight and the issuance of debt capital becomes difficult and unattractive. This was the case after World War I, when the yields on government bonds approached 6 per cent and it was common for those corporations in great need of funds for expansion or refunding to issue bonds, usually short term or callable, bearing 7 or 8 per cent interest. Such conditions make the reinvestment of earnings virtually necessary. On the other hand, the payment of dividends makes stocks more attractive marketwise and encourages financing by new stock issues; thus the payment of dividends may be necessary to new stock financing.

Stockholders' Expectations of Dividends.—Stockholders' expectations must be carefully considered in determining dividend policy. It is almost an axiom of finance that a completely new corporation should not pay dividends on its common stock until

it has emerged from the preliminary testing stage, and anyone

buying such stock accedes to that policy.

It is also usual for investors in preferred stock to expect greater regularity of dividends than do investors in common stock, because the former is bought for investment and yield, while the latter is more likely to be bought with the hope of a capital gain. Moreover, regular dividends, if paid over a period of years, set up a strong presumption for their continuance. Managements of corporations like the Pennsylvania Railroad Company, which has paid a dividend every year since 1848, or American Telephone and Telegraph Company, whose dividend record is unbroken since 1881, would be most reluctant to mar their records for continuous dividends to which they point with pride. A recent survey shows that 203 common stocks listed in the New York Stock Exchange have paid cash dividends every year for twenty-five years or more. Special or extra dividends are sometimes declared so that no presumption of continuity is set up.

The degree of "compulsion" to continue dividends will also be determined by the classes of security holders to whom the stock was sold and whether or not it was represented as a "sound investment" or a "speculation." A small saver who buys the preferred stock of a public utility expects dividends to be continuous, but a large investor in a speculative new venture will be prepared to do without dividends as long as there is need to reinvest earnings. Here again, the management must be moved by a nice sense of stewardship for the property of others.

Taxation and Dividends.—Since 1936 more attention has been given by corporate directors to taxes resulting from dividends. In that year, the Roosevelt administration sought to penalize the reinvestment of earnings by imposing an undistributed profits tax on corporations, under which a special penalty tax was levied on retained profits, ranging from 7 per cent on the first 10 per cent of retained net income to 27 per cent on retained net income exceeding 60 per cent of net earnings. This penalty was imposed in order to force corporations to pay all of their earnings in dividends, and thus activate "stagnant

pools of capital," distribute purchasing power, prevent corporate growth and concentration through reinvested earnings, free stockholders from management "domination" so far as dividends were concerned, and prevent the avoidance of high personal income taxes by rich stockholders. It was partly an economic reform and partly a fiscal measure. But its results were unduly oppressive to small corporations which found it more difficult to get along without reinvested earnings than did large corporations. The latter have always paid out a larger proportion of their earnings as dividends. This penalty on the use of internal funds forced all growing corporations to use the capital markets which, because of business depression and new securities laws, were none too receptive to new issues, particularly after the 1938 recession. The tax was short lived. In 1938 the penalty rates were reduced to $2\frac{1}{2}$ per cent and in 1939 the tax was abolished entirely.

In 1936 all dividends (except, by court ruling, stock dividends) were made fully subject to the income tax of persons receiving them. Prior to that time they had been subject to surtax rates only. This made complete the double taxation of corporate income (once as income to the corporation and again as dividends to the stockholders) which has continued since then. With rising tax rates to individuals in the higher income brackets, the problem of tax avoidance by retention of corporate earnings, particularly in corporations whose stock is closely held, had to be met.

With the repeal of the tax on undistributed profits in 1939, Congress went back to its earlier practice of penalizing "unreasonable" accumulations of corporate profits. A tax of 25 per cent on undistributed net incomes of up to \$100,000, and 35 per cent on undistributed net incomes above \$100,000, was imposed where corporations accumulated profits beyond the reasonable needs of the business. For personal holding companies Congress imposed penalty rates of 65 per cent and 75 per cent. The burden of proof that retention is reasonable is on the corporation, not the Treasury. At first, this part of the law (Section 102) was rather vigorously enforced; Treasury policy was to investigate corporations paying less than 70 per cent of

their earnings as dividends. In 1947, however, the Commissioner of Internal Revenue indicated that penalties would not be imposed unless the corporation withheld "surplus net earnings clearly in excess of the reasonable needs of the business and for the purposes of enabling stockholders to avoid personal income taxes." This statement reassured corporate managements faced with the huge task of financing postwar expansion requirements.

Legal Considerations in Dividend Policy.—Aside from taxation, several legal requirements must be observed in dividend distributions. It is illegal to impair the capital stock by the payment of dividends, and directors are personally liable for such actions. In some states the law restricts ordinary dividends to earnings, present or past, but this is usually interpreted broadly. Dividends from capital are possible in most states if legal procedures are followed and the distributions are clearly labeled. Care should be taken when dividends are paid from sources other than present or past earnings to see that the law of the state of incorporation is complied with.

Except to require that dividend policy be made in good faith, with the interest of the stockholders in mind, the law and the courts do little to influence management discretion regarding dividends. They have repeatedly held that the payment of dividends, whether on preferred or common stock, is a matter of business judgment, not of law, and cases where courts have forced the payment of dividends are rare. Perhaps the most famous exception to this rule was the case of *Dodge v. Ford Motor Co.*, 204 Mich. 459 (1919), in which the directors of the Ford Motor Company were ordered by a Michigan court of equity to pay a dividend to the stockholders.

Provisions of the charter are also important. An exceptional instance of an obligation to pay dividends was reported by the financial press in February, 1944. The Massachusetts Supreme Court held that a declaration of dividends on the preferred and Class A stocks of the Waltham Watch Company was compulsory if the company reported earnings and if dividends did not impair contributed capital. Usually, however, courts will

not inquire into management decisions concerning dividends unless they are clearly arbitrary, or made with the intent to deceive or mislead.

Another well-known legal principle is that all stockholders of a given class shall be treated equally in dividend distributions. Still another legal requirement influencing dividend policy is found in state laws prescribing qualifications for legal investments for savings banks, trust funds, and life insurance companies. Stocks infrequently qualify for the legal list, and only bonds of companies which have paid dividends for a certain number of years have usually been eligible. However, recent revisions in some state laws have omitted the dividend requirement and specify instead a certain rate of earnings available to stock—whether paid out in dividends or not. Obviously under the older laws a company wishing to keep its bonds on the "legal list" was tempted to weaken itself, and its bonds by those very dividend payments. The earnings requirement seems to meet the case more adequately.

Finally, the corporation may have entered into contracts restricting its freedom in dividend declarations. This is particularly likely to be a condition imposed under term borrowing from banks. The typical loan agreement restricts the payment of dividends by freezing the earned surplus at the time of the loan and permits dividends only from future earnings. It also restricts dividends that would reduce the net current assets below a certain level and so freezes a part of the working capital as well. Similar provisions may be written into bond indentures or even into the charter to protect the preferred stock. Obviously, these may seriously restrict dividend payments, even in good years.

Noncash Dividends.—Thus far we have considered the payment of cash dividends only. However, declarations not involving cash payments are frequently made. The more important of these are scrip, property, and stock dividends.

Scrip dividends are promissory notes to pay cash some time in the future. They increase the liabilities of the corporation rather than reduce its assets. They contemplate the distribution

of cash at a later date. Sometimes, scrip dividends are payable either in cash or in stock, as were those of the Pennsylvania Railroad Company in the 1880's and 1890's, at rates varying from 2 to 5 per cent. Since scrip dividends are issued when concerns are short of cash, they are easily subject to abuse. Corporations whose working capital position is deteriorating seek to cover up their weakness by declaring dividends in scrip, much of which can never be paid.) For that reason scrip came to be looked upon unfavorably, except in 1936 and 1937, when it was issued to escape the tax on undistributed profits. Ordinarily a corporation whose cash position does not warrant the payment of a cash dividend is better advised to pay a stock dividend or no dividend at all, rather than indulge in the pretense that it can spare the cash in the future. Only when the future availability of cash is certain should scrip dividends be considered.

Property dividends may be paid to stockholders in property other than cash. A company's products are sometimes distributed in this way. A few years ago, distilling companies paid "whiskey dividends" to their stockholders, largely to escape the heavy wartime excess profits tax. The whiskey was taxable to the individual stockholder as income, but the corporation paid no corporate tax on it, as it had realized no profit. Thus, the Tom Moore Distilling Company in November, 1943, declared a dividend of 27 gallons of whiskey for each share of \$25 par value stock. (The stock rose in price from \$70 to \$160 a share in ten days.) Since about \$200 in federal taxes would have to be paid on 27 gallons to withdraw it from storage, and many federal and state laws (as well as O.P.A. regulations) had to be complied with, probably many stockholders preferred to sell their assignable receipts rather than to withdraw the liquid product.

A more common case of property dividends is found in the recent breakup of public utility holding companies. Shares of subsidiaries are commonly distributed by holding companies to their stockholders in order to comply with the simplification requirements (Section 11) of the Public Utility Act of 1935. This practice avoids the necessity to sell the stocks of subsidiaries on an unfavorable market and gives each stockholder the option of keeping the stock or selling it for cash. For example,

the United Light and Railways Company in 1948 paid dividends on its common stock solely in the stock of the American Light and Traction Company. A few corporations distributed Liberty bonds to their stockholders after World War I in similar fashion. While the term "security dividend" might be applied to such distributions, in reality they are property dividends, not the securities of the declarant company.

By far the most popular type of noncash dividend is the stock dividend. Here the company recognizes the need to reinvest earnings and gives to each stockholder additional stock to represent the reinvestment. In accounting terms this results in a transfer from the surplus to the capital stock account of the amount of the dividend, and differs from a stock split-up in that the latter leaves the surplus and capital stock accounts unchanged and merely divides the capital stock into a larger number of shares. Economically, the stock dividend and splitup are identical in that the residual claim to corporate earnings and assets is divided into more shares. Since the stock equity includes surplus as well as capital stock, the stock dividend simply divides the existing equity into more shares: it gives the stockholder nothing he did not have before. However, it does permit him to convert the reinvested earnings into cash through the sale of the new stock, a procedure that would be inconvenient but not impossible in the absence of the stock dividend.)

Public utility companies, particularly holding companies, during their rapid growth throughout the 1920's frequently declared stock dividends. The North American Company was a striking example of this policy. Operating utility companies subject to state commission control have rarely paid stock dividends, as have the railroads whose policies are subject to the Interstate Commerce Commission. Industrial companies, which more than any other group depend upon reinvested earnings for capital, have no consistent policies in this regard. Large splitups or stock dividends in times of high stock prices are common with them, but regular quarterly or annual payments of dividends in stock are an exception rather than the rule.

The whole program of stock dividend payments to represent reinvested earnings rests on the assumptions that (1) a

corporation should raise its capital by reinvesting earnings, and (2) this should be represented by additional shares of stock. Neither of these assumptions is of universal validity. In fact, something can be said for subjecting the enterprise to the "verdict of the market place" by forcing it to pay dividends in cash and sell new stock to meet its capital requirements. But what if the market is depressed and the sale of new stock involves dilution of existing equities? Should expansion stop? Or should new stock be sold at any price?

On the other hand, it is clear that the periodic payment of stock dividends, which can be sold by stockholders at favorable market prices, helps keep up the price of the stock. Stock dividends are very valuable because stock prices are high, but stock prices are high partly because stock dividends are paid. At least, such was the case with the stocks of some of the public utility holding companies in the late 1920's. Stock dividends yielded stockholders more cash than they would have received if cash rather than stock had been distributed.

Additional impetus to stock dividends was probably given by the Supreme Court decision, in Eisner v. Macomber, 252 U.S. 189 (1920), that stock dividends are not individual income and therefore not taxable, since stockholders do not receive any of the company's assets. After the 1929-32 crash, stock dividend policies became less attractive and were largely discontinued. The control over dividend policies of holding companies and their subsidiaries in the electric power industry by the Securities and Exchange Commission has also had a moderating effect in that previous stronghold of the stock dividend.

Government Regulation of Dividends.—In regulated industries, such as public utilities and railroads, regulatory commissions are sometimes given specific authority to control dividend distributions, but this is exceptional. Even when granted, the controls are not designed to impose restraints upon the ordinary discretion of management. Rather, they may be used to prevent management from impairing the corporation's financial position through unwise dividend policies. Commissions do not initiate dividend declarations nor pass judgment upon each

declaration. In railroad regulation, where controls over finance were belatedly introduced in 1920, the Interstate Commerce Commission has had little direct control over dividend policy. However, through its prescription of accounting procedures it controls the determination of net income; through its control over new security issues it may pass upon the propriety of dividends payable in stock (it has sometimes permitted stock dividends where surplus is large), and through its strategic position in reorganization of failed railroads, it has imposed such requirements as setting aside part of the earnings as reserves for property improvements. All of these affect the dividend policies of railroads.

Among public utilities, state commissions up to 1932 seldom had authority over dividend distributions, which were thought properly to lie within the discretion of private management. Only half of the states had any control over the financial practices of utilities, and these usually took the form of the right to veto new security issues. After that time, however, the growing criticism of utilities, particularly electric power companies, the widely heralded abuses of holding companies, and the spectacular collapse of a few pyramided corporate structures like the Insull empire brought utility reform statutes in many states. The new laws were designed to prevent those holding companies not directly amenable to state control from draining the working capital of their regulated operating subsidiaries through such devices as "upstream loans" and dividend payments. The object was to prevent holding company abuses, rather than to substitute commission judgment for management discretion in broad matters of dividend policy.

This restrictive attitude was carried over into the field of federal regulation of electric and gas holding company systems by the Holding Company Act of 1935. Under Section 12, the Securities and Exchange Commission has exercised considerable authority over such matters as intercompany loans, security transactions, sale of assets, and dividends. The commission has wide discretion to formulate rules designed to prevent practices which undermine the credit and working capital positions of holding companies and their subsidiaries. The act delegated almost unlimited power to the Commission, and is perhaps the most extreme example of control by a government agency over dividend policy that we have anywhere in American corporate life.

The commission has issued many decisions and orders concerning dividends, both on their own merits and in conjunction with simplification plans for holding company systems where dividends (in cash, stock, or property) are incidental to the mechanics of decontrol. On the whole, it appears that the commission has approved dividend policies that seemed appropriate to each particular problem presented. Its decisions have been "practical" rather than "doctrinaire." It has restricted dividends of corporations that needed to conserve working capital. It has permitted the payment of cash dividends on preferred stock that exceeded earned surplus and cut into capital surplus, but it has also disapproved of dividends from capital surplus. It has approved of dividends payable in the company's own stock and in the stocks and bonds of other companies, usually to expedite corporate simplification. It has refused to permit a dividend payable in no-par stock, but it has permitted dividends payable in par value stock. It has disapproved of dividend and interest payments by subsidiary companies to holding companies, where the effect might be to impair the position of investors in the securities of subsidiaries. It has permitted a corporation liquidating its utility interests to create a captal surplus by writing down its capital stock, and then to pay cash dividends to its common stockholders by charging capital surplus, where there were no senior securities outstanding. It has permitted reductions in the stated value of stock to eliminate a deficit in earned surplus or to write down property values. The commission, as has previously been noted, frequently restricts dividends or "freezes the surplus" as a condition of its approval of new bond issues above its ideal 50 per cent debt capitalization level. It has sometimes later modified these restrictions if the working capital position of the company shows decided improvement. On the whole, the commission seems to have permitted dividend practices that are in harmony with fairness and with business prudence. Like corporate directors, it has found that dividend payments depend upon a balancing of many factors that cannot be reduced to rigid and uniform rules.

REFERENCES FOR FURTHER READING

- Bogen, J. I., ed. Financial Handbook, 3rd ed. (New York: The Ronald Press Co., 1948), Sec. 19.
- Buchanan, N. S. The Economics of Corporate Enterprise. (New York: Henry Holt & Co., 1940), Chs. 8, 9.
- Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book III, Chs. 9, 10.
- Field, Kenneth. Corporation Finance. (New York: The Ronald Press Co., 1938), Chs. 25-27.
- Hatfield, H. R. Surplus and Dividends. (Cambridge: Harvard University Press, 1945).
- Hoagland, H. E. Corporation Finance, 3rd ed. (New York: McGraw-Hill Book Co., Inc., 1947), Chs. 29-33.
- Husband, W. H., and Dockeray, J. C. Modern Corporation Finance, rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Chs. 22-24.
- Paton, W. A., ed. Accountants' Handbook, 3rd ed. (New York: The Ronald Press Co., 1943), Secs. 3, 19.

Chapter 14

CORPORATE FAILURE AND REORGANIZATION

Not all business enterprises are successful. Studies of the mortality of new concerns have shown that only a minority survive as long as ten years. The great majority of the failures sink into oblivion, seemingly a social waste as well as an individual loss. Yet no one has found a way to preserve the freedom to venture which makes the economy dynamic without at the same time leaving the door open to mistakes and failure. For economic freedom is the freedom to make mistakes as well as the freedom to succeed. No one but the national planner with autocratic powers can assure survival of the inefficient firm, and to do so it is necessary to eliminate economic freedom.

Corporations suffering from financial maladies sometimes die, but if they are large and important they are more likely to be recapitalized or reorganized than liquidated. Small concerns frequently reach the end of their financial rope, cease operations, and let the creditors fight over the business carcass. Sometimes they, like larger concerns, get a new lease on life by coming to an agreement with creditors or security holders or by going through a process of compulsory readjustment known as reorganization. To the failed corporation this is a phase of financial policy that is vital to its future well being. It is also a crucible in which the real rights of various security holders are tested.

Like many other phases of corporate policy, financial reconstruction has become subject to a large measure of government control. 'The whole process has become so highly legalistic and technical that it sounds complicated, but the economic features

are fairly simple. One may smile with Thurman Arnold 1 when he satirizes "the ritual of corporate reorganization" as "a combination of a municipal election, an historical pageant, an anti-vice crusade, a graduate school seminar, a judicial proceeding, and a series of horse trades, all rolled into one, thoroughly buttered with learning and frosted with distinguished names." But perhaps reorganization is not as bad—nor as interesting as that. At any rate it is the accepted way by which corporations meet financial crises, and many a respectable and impregnable corporation of today has been restored to financial health through its procedures.

Of course it must not be thought that reorganization is a sort of cure-all. It is more accurately described as a redistribution of claims so that the funadmental curative processes of profitable operation inherent in the business and its management can be realized. Without prospects of profitable operation, reorganization can be of little avail, and liquidation is the proper prescription for the ailing patient.

Causes of Failure.—Business corporations fail for any number of reasons. Sometimes poor management is to blame; sometimes because of a change in public taste even the best management finds it impossible to salvage an obsolescent industry. A. S. Dewing, whose classic studies of leading corporations provide one of the best sources of factual knowledge on the subject, distinguishes superficial causes, such as the shortage of working capital, from the fundamental causes of failure.2 Among fundamental causes he lists (1) excessive competition, which caused the failure of huge consolidations in the cordage, glucose, starch, asphalt, and cotton yarn industries, and which has been a persistent cause of failure among railroads; (2) unprofitable expansion, which ruined many manufacturing companies, sank many public utility holding companies, and brought financial disaster to such railroads as the New Haven, Union Pa-

¹ Thurman Arnold, The Folklore of Capitalism (New Haven: Yale University Press, 1937), p. 230.

² A. S. Dewing, The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book V, Ch. 2. See also his Corporate Promotions and Reorganizations (Cambridge: Harvard University Press, 1914).

cific, Northern Pacific, Milwaukee, and Atchison; (3) cessation of public demand, which dealt a mortal blow to the American Bicycle Company; and (4) the assumption of a burden of bond interest or other fixed charges that some corporations could not carry, or the draining of needed working capital by paying unjustified dividends to stockholders. The last cause may be the result of poor business judgment or of a desire to keep the firm's credit good, its stock prices high, or its bonds on the "legal" list. Whatever the reason it is a reflection of unwise financial policy.

Perhaps to these causes should be added prolonged downturns of the business cycle resulting in losses beyond the size that might prudently be foreseen. The virtual cessation of demand for heavy machinery, railroad equipment, and new construction during the early 1930's brought some concerns to the brink of disaster even though they were strong enough to ride out ordinary depressions. Sometimes business failures are due to dishonesty, fraud, and other violations of law, like the collapse of the International Match combine of Ivar Kreuger, or the questionable financial practices associated with the Insull utility empire, or the selfish disregard for investors' interests by those who trafficked in investment trusts, as revealed by the investigations of the Securities and Exchange Commission. But the borderlines between excessive optimism, official carelessness, and downright fraud are hard to draw. Inadequate accounting for depreciation, obsolescence, and depletion may lead to the overstatement of earnings and the distribution as dividends of assets needed to continue operations on a profitable basis. The sharp decline in commodity prices was a widespread cause of financial embarrassment in 1920 and 1921 and might be again. Heavy or discriminatory taxation, restrictive regulation. changes in tariff laws, wars, disasters, and technological changes may all contribute to business failure.

Recapitalization.—Not all failures are equally serious, nor is financial rehabilitation uniformly complicated. Sometimes consent to change such nominal matters as capital stock or surplus is all that is necessary. During the depressed 1930's many

corporations recognized losses in the value of their assets by writing down their book valuations. Sometimes regulatory commissions have ordered a reduction in the book valuation of utility property to conform to depreciated cost where these adjustments exhausted the surplus accounts and impaired the capital stock; the effect was to prevent future dividends and give the financial statements a notably weak appearance. The remedy was easy: surplus could be restored by writing down capital stock and transferring a corresponding amount to surplus. As we have seen, this could be done by a reverse stock split-up or split-down in which stockholders get fewer shares, or by permitting the same number of shares to remain but reducing the par value, or by changing from no-par to low par stock. The latter usually involves an amendment to the charter.

Where a readjustment affects several classes of security holders and their contract or equitable rights, the case is more complicated. Preferred dividends may be in arrears as the result of inadequate earnings. These may be paid off in cash, new preferred stock, new common stock, or by a combination of all three. Here, the necessary consent of the preferred stockholders is usually induced by the promise to return to a regular dividend basis, and "hard bargains" are quite frequently accepted as the lesser of two evils. Dissenters are usually paid in cash through a call of the stock. If bond interest is at stake, voluntary readjustments may be sought. The success of this measure depends upon the willingness of the great majority of these and other creditors to make concessions rather than precipitate receivership or bankruptcy.

Along with the problem of readjusting claims goes the problem of replenishing working capital, whose meagerness may have brought on the crisis. Sometimes this can be done by selling a new prior-lien issue of bonds if existing bondholders and creditors will consent to giving up their priority of claim and if an investment bank can be found to risk its money and reputation on such an issue. In either a simple recapitalization or a complicated reorganization existing security holders must usually put up the new money. If the failure is not severe, stockholders may surrender part of their stock for resale by the cor-

poration, but more commonly they are "assessed" so much per share, which must be paid in cash. Those responding are given new stock for old, and frequently new preferred stock or junior bonds for the cash assessment. If the failure is so serious that the stock has no present or potential value, the junior bondholders may even be assessed as a condition of retaining an interest in the corporation. Of course the weakest bonds will be assessed the most. Current creditors may be asked not only to postpone maturities but, if their position is weak, to help provide new working capital.

When sacrifices of this magnitude are required, however, it is almost impossible to achieve voluntary adjustments. A few dissenters can be carried along or paid off in cash, but the plan becomes both impractical and inequitable if the vast majority does not accept it. It is sometimes necessary to use compulsory "composition," that is, to force the will of the majority (usually with court sanction) on the minority.

In some cases, as in the 1920-22 period, the difficulty is looked upon as temporary, and the problem is to postpone interest payments and raise new cash to operate in the period of crisis. Here the creditors may take over the management of the business under a *creditor's committee* until the financial condition of the business is improved. Where the obligations consist largely of floating debt and bank loans, the bankers will take the lead in temporary management arrangements of this kind.

A creditors' committee avoids the adverse publicity and expense of receivership, and the necessity to force through an immediate readjustment of all claims. It is likely to succeed only if banker management is efficient or if "natural causes" restore solvency and earning power to the corporation. It is usually not thoroughgoing or drastic enough to cure deep-seated trouble that calls for the apportionment of heavy losses among many classes of security holders.

Reorganization.—Where creditors and stockholders cannot agree, solutions through compositions, creditors' committees, or other voluntary arrangements are out of the question and re, organization under the protection of the courts is then necessary.

This was common even before Congress "streamlined" the corporate bankruptcy laws in the 1930's but the procedure was somewhat different. Before 1933, most corporate reorganizations were privately worked out while a court of equity held the property together and operated it through its agent, the receiver. Since that time an alternative method is available under which courts and government agencies may directly intervene in the reorganization process under a trustee in bankruptcy.

Perhaps it is well to note that under the Bankruptcy Act of 1898 bankrupt corporations (except railroads and municipalities) were permitted to purge themselves of their debts by turning over their properties to their creditors, but this usually led to the liquidation of the business. Both equity receivership and modern trustee reorganization, however, contemplate a continuation of the business after its debts have been settled by compromise, new capital has been obtained, and the fundamental weaknesses have been corrected. The essence of reorganization is the preservation of the corporation as a going concern, not only because some concerns, like public utilities, and railroads, cannot suspend service without government consent, but also because the best way to salvage the maximum of value for those who have interests in the corporation is to preserve its worth as a going concern. Piecemeal liquidation shrinks the realizable value of specialized assets to small proportions, to mere scrap value

Receivership in Equity.—Under this procedure a corporation unable to meet its obligations seeks the protection of the courts in order to prevent the disruption of the business as a unit. As soon as a financial crisis appears inevitable, the corporate management defaults on some obligation, a "friendly" creditor brings suit, and the corporation asks a court of equity to conserve its property by placing it in receivership under the court's protection. The purpose, of course, is to stay the enforcement of all creditors' claims (mortage bondholders as well as unsecured creditors) until a plan of reorganization can be worked out. The court appoints a receiver, frequently the president of the corporation, to operate the property and to obtain capital by issuing

receivers' certificates, while it holds this umbrella of legal protection over the property. The contending parties, creditors and stockholders, are left to work out their own reorganization plans. This process is still in use but most reorganizations are now effected under the bankruptcy laws. An understanding of equity receivership, however, will provide a background for the study of reorganization in bankruptcy.

As soon as, or sometimes before, receivership is announced, committees to protect the interests of the different classes of security issues are organized—usually at least one for stockholders, one for bondholders, and frequently one for each major class of security holders. These committees are formed by those in positions of confidence or by those having an obligation to protect others. Stockholders' committees are commonly organized by management or by those having a large stock interest in the corporation (holding companies, investment trusts, etc.); bondholders' committees by a banking house which sold the bonds or by the banks and insurance companies with large holdings of the defaulted securities. A commercial banker is likely to organize holders of the floating debt.

There is no limit to the number of committees, and sometimes rival committees appeal for the support of a particular class of security holders. On occasion protective committees are organized for ulterior motives. Management may pretend to protect the interest of creditors when it really wants to reduce their claims to a minimum. Unemployed lawyers may organize committees in order to get themselves appointed counsel. Even the legitimate initiators of committees—management, bankers, investors, lawyers—recognize this as a lucrative field in which to employ their talents. Before 1933, the fees paid managers and members of committees, depositories of securities, counsel, and underwriters of new securities were determined by the parties themselves, subject to no regulation whatever. Now they must be found reasonable by the court.

By and large, investment bankers have taken a dominant position in reorganizations. Paul M. O'Leary found that of 341 protective and 105 reorganization committees organized from 1931 to 1935, 232 had banker majorities and 32 banker

minorities.³ Perhaps since that time there has been a trend toward greater importance of institutional investors and others, but the investment banker will probably always play an important role in committee organization because of his knowledge, responsibility, and desire to underwrite new issues.

With committees organized, the solicitation of the support of security holders is undertaken. (Those with bondholders' and stockholders' lists—bankers and management—obviously had the inside track before the present law made the lists more generally available.) Security holders consenting to be represented by the committee indicate their assent by designating the committee as their attorney, or by sending their securities to a designated depository (usually a trust company) and becoming a party to a deposit agreement under which the committee has broad powers to act in their behalf.

Armed with powers of representation, the committees usually appoint one of their members to meet with representatives of other committees to form a "reorganization committee" which attempts to devise a plan of reorganization. To be workable, the plan must be acceptable to a very large majority of all security holders. Since each committee has interests antagonistic to other committees, there is much bargaining, horse trading, and jockeying for position in which a clever operator may get a better deal for his security holders than their legal position warrants. However, those in positions of impregnable legal priority usually make few or no concessions and the residual claimants (stockholders) are forced to make the most serious sacrifices and frequently put up new money in order to participate at all. The usual result of reorganization is the scaling down of fixed charges by the exchange of income bonds or preferred stock for all or part of the junior (or even senior) debt. The soundest issues are sometimes left "undisturbed," and most of the new preferred and common stock is placed in the hands of previous creditors or holders of preferred stock; little or nothing is left for the common (or sometimes preferred) stockholders, except as they supply new cash. This is the heart of the reor-

⁸ Paul M. O'Leary, "Banking Groups in Corporate Reorganizations," American Economic Review, June, 1939, p. 337.

ganization process, and under receivership it is worked out wholly by private agreement, while the property is being operated for the court by a receiver.

After the bargaining is completed, the problem is to get the plan accepted by as many creditors as possible. There are always dissenters who threaten to take legal steps to enforce their claims just as soon as receivership is lifted. To bring them into line and to provide a basis of settlement with them, it is frequently necessary to sell the corporation's property under judicial sale. A suit to foreclose a mortgage is usually brought and the court may order the entire property sold at public auction at some designated spot. Since few bidders are able to buy a multimillion dollar railroad, utility, or manufacturing concern, the reorganization committee is always able to purchase the property. However, a difficulty often arises at this point: the reorganization committee, commonly the sole bidder, wants to bid for the property at a low price in order to "freeze out" as many dissenters as possible, since the purchase price fixes the claims of the various securities. Because a low price might be wholly unfair to dissenting junior security holders, the court, to protect them, sets a minimum, or "upset" price, below which the property cannot be sold. But this upset price has to be low enough to give little encouragement to dissenters or it would defeat the entire plan. Thus courts have to temper justice with expediency.

The reorganization committee usually bids in the property at a little more than the upset price. A new corporation with a name similar to the old is organized to take over the property. It issues the new securities according to the plan, pays the expenses of reorganization, and starts the business on its way again, free from court control.

Results of Equity Receivership.—Since the financial reconstruction of the corporation is usually effected through compromise, excessive concessions might be exacted from groups in strong contractual position, and it is customary to let even residual claimants, principally stockholders, with little equity in earnings or assets participate in the distribution of new securities if they pay their assessments. This has had two results. First,

the reorganized corporation sometimes has a larger total capitalization than its predecessor, but a larger proportion of the securities has mere contingent claims if earnings are ample.

The other result has been wide acceptance of the doctrine of "relative priority" of claims against the corporation. Under this theory no groups of bondholders or stockholders are necessarily "frozen out" because the value of the assets is insufficient to allow them anything after prior claims are met. Rather, each class is given new securities ranking in the order of the old securities, and as long as the relative priority of claims to assets and earnings is maintained the plan is thought to be fair, legal, and above all, expedient. Stockholders and junior creditors can hope that part of their original investment will be salvaged through future profitable operations, and on this hope they may be induced to put up more money for the benefit of the business and all of its creditors.

The main purposes of reorganization, then, are to remove insolvency, reduce fixed charges, and place the corporation on its feet again, not to adjudicate and settle claims based on the supposed value of the corporate assets at a moment of time. It looks toward the continuation of operations and the preservation of all intangible values rather than to liquidation. It assures a continuity of management; it prevents frustration of plans by lawsuits brought by those who might otherwise be completely dispossessed; and it places less of a premium on the admitted guesswork concerning future earnings and asset values. Rather give hostage to fortune than cut off legitimate claims forever on the basis of a fallible estimate of value is the essential philosophy of the theory of relative priority. Let no junior claimant participate in reorganization by receiving any of its securities until the claim of each senior creditor has been entirely satisfied is the theory of absolute priority. Most equity reorganizations have been worked out on the basis of relative priority.

It must not be thought that an equity reorganization committee, by shrewd and clever bargaining, can defeat essential rights laid down by contract. The committee might persuade creditors to make concessions, but it cannot force them to subordinate their claims to others in weaker contractual positions.

That creditors may successfully upset reorganization plans which ignore their claims, while permitting stockholders to participate, was clearly demonstrated in the Boyd case, 228 U.S. 482 (1913). Here the Supreme Court ruled that an unsecured creditor could sue the successor company to recover a debt unpaid under a reorganization plan in 1896, which allowed preferred and common stockholders to receive new stock (par for par) by paying assessments of \$10 and \$15 a share respectively. The court held invalid any device for preferring the claims of stockholders over creditors. Of course, it must have presumed that the stockholders received new stock worth more than the assessment or there could have been no preferment.

New Emphasis on Absolute Priority.—Despite the Boyd decision, courts continued to approve reorganization plans providing for creditor concessions and stockholder participation, and the absolute priority principle remained a sort of formal legal dictum rather than a working principle until 1939. In that year, the Supreme Court, in Case v. Los Angeles Lumber Products Co., 308 U.S. 106, unanimously held that the fairness and legality of any plan of reorganization should be measured by the standards of the Boyd decision, and that plans under the new bankruptcy legislation (Section 77, Section 77B, and Chapter X) must conform to the requirement that until creditors' claims are paid in full, stockholders cannot participate. That is true even if over 90 per cent of the bondholders consent to a plan, as they did in the case under review. In the reorganization of the Los Angeles Lumber Products Company, the bondholders received preferred stock and the Class A stockholders received new common stock (without assessment) although the value of the assets was far less than the bondholders' claims. A dissenting bondholder brought suit and upon appeal the Supreme Court ruled the plan invalid, although it might have been valid had the stockholders made new contributions equal to the value of the new stock they received. In subsequent cases the court has held rigidly to the "fixed principle" of the Boyd and Los Angeles Lumber cases in all types of reorganization, and stockholders

have been rather ruthlessly frozen out where the value of the property failed to cover creditors' claims in full.

But how shall this all-important value be determined? By accounting records? By engineers' estimates? By the value of outstanding securities? By the purchase and sale of similar concerns, if there are such? None of these criteria of value seems to be final. In the Consolidated Rock Products Company case, 312 U.S. 510 (1941), the Supreme Court insisted that the basic determinant of value is the expected earning power of the concern, even though this cannot be accurately predicted. In subsequent cases involving railroad reorganizations, the courts have upheld I.C.C. plans for reorganization based upon expected "normal" earning power rather than upon the much higher wartime and postwar earnings actually experienced.

On the I.C.C.'s guess that postwar earnings would be nearer the depressed 1930's than the prosperous 1940's, stockholders were almost completely denied participation in the reorganization of such railroads as Chicago and Eastern Illinois; Western Pacific; Denver and Rio Grande Western; Chicago, Milwaukee, St. Paul and Pacific; Rock Island; St. Louis and San Francisco; Missouri Pacific; New Haven; and others. Even the best forecasts of earnings are likely to be wide of the mark. In November, 1948, an I.C.C. examiner raised the estimated "normal" earning power of the Missouri Pacific System to \$25 million, from a previous estimate of \$22 million in 1944. Actual earnings were over \$30 million every year from 1941 to 1948.

Occasionally there is a marked exception, like the St. Louis-Southwestern Railway, which was discharged from trusteeship in July, 1947, with its old capital structure, top-heavy with bonds, intact. All creditors' claims had been met in full, and the stockholders retained their original positions.

Even after several years of high earnings the Supreme Court has continued to uphold I.C.C. plans based upon low estimates of future earnings. The resentment of stockholders has led to intense litigation in which cases have been shuttled between the I.C.C., the district courts, the circuit courts of appeal, the Supreme Court, and back again, thus prolonging the period of reorganization and demonstrating the rigidity into which the process

of reorganization has been forced and the power of those who guess at future earnings to affect the property of others.

To provide some hope of relief, Congress, in July, 1946, passed the Reed-Wheeler Bill, under which railroads would be returned to voluntary reorganization if it could be worked out by stockholders. This bill was pocket-vetoed by President Truman, but in April, 1948, the Mahaffie Act became law. Under its terms railroads, including those under equity and bankruptcy reorganization, may attempt voluntary reorganization with the approval of the I.C.C. when 25 per cent of the stockholders so request. If 75 per cent of the affected security holders approve, the changes may be made effective by the I.C.C. and the courts. This act is expected to facilitate recapitalizations and avoid the necessity for the delays and wholesale liquidation of stockholders in such cases. How it will work out remains to be seen. Possibly the need for capital for improvements, the accumulation of special reserve funds to protect bondholders, and the repurchase of bonds in any case will leave little cash available for dividends for some years to come. The stockholder might find that he is "preserved" but only a long period of profitability will make his stock very valuable.

It is also important to note that in simplifications under the Public Utility Act of 1935 the Supreme Court has not held rigidly to the "absolute priority" doctrine. In 1945 the court by a five-to-three majority upheld an order of the Securities Exchange Commission approving a plan for liquidating the United Light and Power Company by distributing about 95 per cent of its assets to its preferred stockholders and the remaining 5 per cent to the common stockholders, even though the preferred stockholders had not received their full liquidating preferences. The creditors had been satisfied. In this Otis case, 323 U.S. 624, the court held that despite liquidation in fact, the rights of the stockholders should be judged as if the company were a going concern, and that the plan was "fair and equitable" even if the preferred stock received securities whose present value was less than their priority in liquidation. It might be pointed out that reorganization is not liquidation, and the only way this decision can be squared with the dogmatic acceptance of the "absolute priority rule" in other reorganization cases is that there is a distinction between rights in reorganization precipitated by insolvency or bankruptcy and those in the involuntary liquidation of a solvent corporation because it is forced by law.

Priority of claims is partly determined by private contract and partly by law. The Bankruptcy Act and some state laws give such claims as taxes and accrued wages priority over secured debts. Expenses of receivership and receivers' certificates are usually given preferred positions. Even unsecured creditors who have furnished working capital needed to keep the firm in operation have been accorded priority of claim to the current assets in some cases, although there were equal claims outstanding. However, court decisions on this matter are by no means uniform.

Reorganization in Bankruptcy.—Amendments to the Bankruptcy Act of 1898 have provided machinery for reorganization that has largely replaced reorganization under receivership. Section 77, designed to speed up and improve the reorganization of railroad corporations, was enacted in the last days of the Hoover administration in 1933. Section 77B, applying similar procedures to nonrailroad corporations, was passed a year later. Both have been amended, and the latter was displaced by Chapter X of the Chandler Act, which codified and revised the law as it applied to nonrailroad corporations.

Perhaps the best way of approaching reorganization procedure under bankruptcy is to recognize that while the problems of financial reconstruction are identical, equity receivership was frequently criticized as expensive and prolonged, and in some cases it brought unfair results. Under the Securities Exchange Act of 1934, Congress ordered the S.E.C. to undertake a comprehensive study of protective and reorganization committees, and a series of lengthy reports, with recommendations, was issued. As a result there was a general reorientation under which protective committees were subjected to regulation and power transferred to the courts and other government agencies.

It is not difficult to find fault with the way in which reorganization in equity sometimes took place. Managements and

bankers were not always unselfish in seeking to dominate the reconstruction process. They sought to protect their jobs, their "inside tracks," and their "patronage." They alone usually had access to bondholders' lists and so were on the ground floor in the solicitation of support. Deposit agreements sometimes gave them unrestrained authority and the security holder had little choice or opportunity to approve or reject the plan. Persons with conflicting personal interests sometimes became members of committees. Excessive fees to committee members, their counsel, and depositories made reorganization costly, and no independent check on such expenditures was provided. (A Senate committee found that it cost \$7 million to reorganize the Milwaukee Railroad between 1925 and 1928. Of this amount. lawyers got \$2 million, reorganization managers \$1 million, receivers \$500,000, depositories \$500,000, trustees under mortgages \$500,000, and so on.) Even where government agencies, such as the I.C.C. for railways and state commissions for public utilities, were concerned, power was usually limited to the approval or disapproval of new security issues arising out of reorganization. These agencies had no authority over the reorganization process itself; they had little choice except to approve the new securities or force the whole burdensome process to be repeated.

Moreover, no impartial body had authority to pass on the over-all fairness of the plan. Property rights of dissenters were rather ruthlessly dealt with through the formality of judicial sale and upset price, and despite the Boyd decision courts had no stomach to disrupt plans based on "relative priority" as long as they were accepted by the great majority of those having superior claims. The test of practical workability and of reasonable compromise negotiated by the conflicting interests themselves took the place of rigid enforcement of a legal dogma by the courts. Finally, equity procedure had no easy way of dealing with dissenters who started legal proceedings with little merit in hopes that they would be paid a money settlement or be "bought off" for their nuisance value. This prolonged and increased the cost of reorganization to the detriment of all legitimate interests.

Only by cash payments or judicial sale could these "strikers" be dealt with.

The New Procedure of Reorganization.—Under the revised bankruptcy laws, there are some differences between reorganization of railways (under Section 77) and other corporations (under Chapter X). The details are not of great importance. Either one or the other could be discussed, but since Section 77 served as a model for Chapter X, its chief features will be outlined.

The process of reorganization may be started by either the corporation or holders of 5 per cent of the debt. They file a petition in a federal district court, stating that the corporation is insolvent or unable to meet its debts and desires to reorganize. If the court approves the petition, it selects one or more trustees from a panel approved by the I.C.C. to operate the debtor's property. To insure an impartial investigation of past management, at least one trustee must have had no previous connection with management. With the consent of the I.C.C., trustees' certificates may be issued to raise necessary cash. Committees representing creditors and stockholders may be voluntarily organized, as under equity receivership, but their expenses are subject to approval by the court within limits fixed by the I.C.C. Solicitation of proxies must be approved by the I.C.C. Those having bondholders' lists must make them available at the request of the trustees. During the trusteeship the judge may direct the trustees or the I.C.C. to investigate past management with a view to legal action by the corporation if irregularities are found.

The law requires that the debtor corporation file a plan of reorganization within six months after the petition, but an extension of six months may be granted. Plans may also be filed by the trustees, by 10 per cent of any class of creditors or stockholders, or, with the consent of the commission, "by any party in interest." The I.C.C. holds public hearings on such plans, and renders a report approving a plan, or setting forth one of its own, or refusing to approve any plan. It is here that the I.C.C. has great power to shape the essential provisions of

the reorganization. After the plan is certified by the I.C.C., the court gives notice to interested parties and holds hearings if there are any objections to the plan. After the hearings, the judge approves the plan if it is found to be "fair and equitable" to all classes of creditors and stockholders, if the fees and expenses are reasonable, and all costs are covered. If the plan is rejected by the court, it is referred back to the I.C.C. for reconsideration.

If the court accepts the plan, the I.C.C. submits it to each class of creditors and to stockholders (if the debtor is solvent), although it need not submit it to particular classes of stockholders or creditors if (1) their interests are not materially affected, or (2) their claims have no value, or (3) the plan calls for the payment of cash to them for their claims. If two-thirds of each class vote in favor of the plan it is confirmed by the court, and even if that approval is not forthcoming from particular classes it may still be confirmed if the judge finds it is equitable to those rejecting it and that rejection was not reasonably justified. Thus under the scrutiny of the court, the majority can force minorities into line without resort to judicial sale.

It is of interest to note that in determining the vital question of the value of claims, the law requires the commission to give primary consideration to the "earning power of the property, past, present, and prospective, and all other relevant facts," and only minimum consideration to such matters as cost of the property (original or reproduction) which are so important in the determination of "fair value" for rate-making purposes. We have already seen how I.C.C.-approved plans have usually found the claims of all stockholders to be worthless, although on the basis of its own valuations for rate-making purposes, substantial equities for the stock would exist.

Finally, the law empowers the court to order the plans into operation, with the corresponding modifications in contract rights. Securities issued under such plans are exempted from the registration requirements of the Securities Act of 1933. The corporation is absolved from its debts except those that are created by the plan of reorganization, and it begins life anew without having to change its legal clothing by acquiring a new charter or a new name.

Under equity reorganization, the underwriting of security issues to raise cash was usually necessary to consummate the plan. Under the new procedure the investment banker may underwrite a new issue, but it is much less common since there is no need to raise cash to pay off dissenters. Assurance of continuity of management by use of the voting trust may be used under both old and new procedures.

Chapter X.—The Chandler Act Amendments of 1938 apply much of the above procedure to nonrailroad corporations, except that the role of the I.C.C. is divided between the court and the trustee, who must be disinterested and who is charged with responsibility of preparing a plan of reorganization. For expert advice on any plan the court may call upon the Securities and Exchange Commission for an advisory report. If the corporate debt is over \$3 million, the plan must be referred to the commission for its opinion. Court approval is given if the plan is fair, equitable, and feasible; the court order and the commission's opinion are then sent to all creditors and stockholders. Only after this is done may any solicitation of security holders take place.

Acceptance by two-thirds of each class of creditors and a majority of each class of stockholders, subject to the court's right to overrule objections by particular classes not acting in good faith or adequately protected by the plan, permits the court to confirm the plan if it sees fit. However, it may hold additional hearings at which all parties at interest, including the Secretary of Treasury and the S.E.C., may be heard. The court must approve all costs and expenses and it exercises control over protective committees and deposit agreements. In the reorganization of intrastate public utility corporations, state regulatory commissions must approve the final reorganization plans.

Space does not permit an extended discussion of nonrailroad plans of reorganization as they have been worked out. It is important, however, to note that advisory opinions by the S.E.C. have usually carried a great deal of weight. The commission has created a special Reorganization Division to investigate and

report on such plans. It frequently has become a party to reorganization proceedings at its own request. In general, the S.E.C. has followed the "absolute priority" doctrine laid down by the Supreme Court, and has shown a strong tendency to posit plans upon expected earning power. Thus its policies parallel those of the I.C.C. in the railroad field.

Recapitalization Under the Public Utility Act of 1935.—In the simplification of public utility holding company systems under Section 11 of the Public Utility Act of 1935, the S.E.C. has direct power to order the recapitalization of firms undergoing the shrinking process. Holders of securities may be forced to accede to the plan of the commission by court order, and the equivalent of a compulsory corporate reorganization is the result. The commission has issued many orders under its jurisdiction in these cases, and sometimes an objective as simple as the redistribution of voting power may require a major recapitalization. For example, the Seattle Gas Company, after being reorganized under Section 77B in 1935, was further ordered by the S.E.C. in 1947 to simplify its capital structure by issuing new common stock in the place of old first preferred, second preferred, and common stock. On the basis of anticipated earnings, the commission found that the common stock was worthless and the second preferred nearly so; accordingly it approved the company plan whereby 99 per cent of the new common stock went to the holders of the old first preferred stock. The same general set of principles seems to be espoused in all of its reorganization activities.

An interesting case in which the "doctors" disagreed arose when the S.E.C. in 1946 ordered the Kings County Lighting Company to give 7½ per cent of the new common stock to old common stockholders in a recapitalization under the Public Utility Act. The New York Public Service Commission opposed this on the ground that the value of the assets was insufficient to cover the claims of the preferred stock, placing the common stock "under water" so that it was not entitled to any securities in the recapitalized company. This indicates that at

least one state commission is more severe on common stock-holders than is the S.E.C.

The risk of an unfair plan of reorganization because of a faulty forecast of future earnings is highlighted by a recent decision of the S.E.C. in which it reversed its previous order because it had been based on an estimate of earnings that experience demonstrated to be too low. In 1945 the Commission had approved a company-sponsored plan of the Northern States Power Company that would have given owners of the holding company preferred stock 90 per cent of the common stock of the subsidiary, and common stock 10 per cent of the stock. In 1948 this was changed to 78 per cent and 22 per cent after common stockholders, led by New York bankers, convinced the commission that the original plan was unfair. The district court confirmed the new plan.

Appraisal of New Procedures.—An appraisal of the new reorganization procedures is difficult. Generalizations are likely to be incorrect. In the railroad field we have seen how the new law has delayed rather than expedited reorganization. Perhaps equity receivership would have been slower than formerly, but there is no proof of it. The Milwaukee road was reorganized in three years in the late 1920's, but it took ten years under the new procedure.

Whether the new results are more equitable than the old is no small question. Is a rigid adherence to "absolute priority" with its usual complete elimination of stockholder participation fair, especially when high earnings are disregarded? Is an approach through bargaining and compromise fairer than extinguishing irretrievably all ownership claims in times of trouble? In our farm mortgage moratorium laws and refinancing of farm mortgages we took the position that creditors must be forced to sacrifice some of their rights so that owners could retain their property even though the value of their farms at the time did not cover the mortgage claim. We did not enforce the letter of the debt agreements against farmers. It would be considered "inequitable." Is more drastic enforcement equitable

only against owners of corporations? Or are the conditions different enough to warrant different treatment?

There would perhaps be agreement that supervision of the reorganization process by disinterested agencies, such as the courts, the trustees, and the regulatory bodies, is likely to result in greater objectivity and even-handed dealing with all security holders than when the process is dominated by management, the bankers, and the lawyers. Moreover, past errors or mismanagement are more likely to be brought to light and corrected. Scrutiny of expense accounts may result in more reasonable fees, although neither the courts, the I.C.C., nor the S.E.C. has been niggardly in this respect. And if the new procedures delay reorganization, the total cost may be greater than under courts of equity. Perhaps delay has been more common in railroad reorganizations, but necessity for repeated hearings and a tendency to invite litigation seem to be the greatest weaknesses of the new procedure. Of course, not all equity receiverships are speedily terminated. Something of a record was established by the Shawmut Mining Company which was petitioned into receivership in 1905 and remained under the federal court in Pittsburgh for over forty years after that time. But usually there are enough incentives to get out of receivership and enough room for bargaining, conciliation, and adjustment so that termination within a few years is possible.

Then, too, it is likely that any attempt to place the management of the company's affairs in the hands of a "disinterested" trustee has its drawbacks. In fact the law specifically recognizes the importance of management by permitting officers to be cotrustees. Thus the complete, impartial, and thoroughgoing investigation of past management may be more an ideal than a common practice. If past management is excluded, operations are likely to suffer, and even the independent trustee will normally lean heavily on management for advice in the administration of the corporation's affairs. However, the fact that there is one independent trustee makes the detection of inefficient or dishonest management more likely than under management-dominated equity reorganization. Finally, the practical result of control by such bodies as the I.C.C. and the S.E.C. has been to make

reorganizations more drastic. This has been costly to stock-holders but it has provided the kind of surgery that is more likely to prevent recurrence of the disease. Not only are capital structures pared drastically, but many plans omit any kind of fixed charge or bonded debt.

All in all the essential economic and financial problems of reorganization are the same in both cases. Differences in legal procedures should be looked upon as variations in means, not ends, which consist of the financial rehabilitation of corporations that, for one reason or another, have failed.

REFERENCES FOR FURTHER READING

Bogen, J. I., ed. Financial Handbook, 3rd ed. (New York: The Ronald Press Co., 1948), Secs. 21, 22.

Buchanan, N. S. The Economics of Corporate Enterprise. (New York: Henry Holt & Co., 1940), Chs. 13, 14.

Cherrington, H. V. Business Organization and Finance. (New York: The Ronald Press Co., 1948), Ch. 12.

Daggett, S. Railroad Reorganization. (Cambridge: Harvard University Press, 1908), Ch. 12.

Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book V.

Dewing, A. S. Corporate Promotions and Reorganizations. (Cambridge: Harvard University Press, 1914).

Field, Kenneth. Corporation Finance. (New York: The Ronald Press Co., 1938), Chs. 28-30.

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed. (New York: Prentice-Hall, Inc., 1948), Chs. 26-29.

Husband, W. H., and Dockeray, J. C. Modern Corporation Finance, rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Part VII.

Lyon, Hastings. Corporations and Their Financing. (Boston: D. C. Heath & Co., 1938), Chs. 39-44.

Securities and Exchange Commission. Report on the Study and Investigation of the Work, Activities, Personnel and Functions of Protective and Reorganization Committees. (Washington, 1936-1939).

Taylor, W. B. Financial Policies of Business Enterprise. (New York: D. Appleton-Century & Co., Inc., 1942), Chs. 32-35.

Chapter 15

CORPORATE GROWTH AND COMBINATION

The Problem of Size.—Underlying most decisions of corporate managements is the assumption that growth in size is the normal course of every successful concern. In fact success is frequently measured by size. To Americans the growth of an individual business is just as desirable, and perhaps as inevitable, as the growth in population, areas of usable land, markets, volume of production, and national income that has characterized our national life. Growth, of course, has both its individual and its social aspects. If success and size go hand in hand it means that the successful corporation must mold its financial policies to meet the requirements of growth. As we have seen, working capital must be conserved, dividends restricted, and new issues of securities sold to meet the financial needs of expansion.

On the other hand, the growth of corporate size has brought challenging questions of social policy. Is growth in the size of the business unit a threat to our social and political institutions? Can economic freedom for the individual exist in fact. as well as in name, if we have corporations like American Telephone and Telegraph, General Motors, United States Steel, Pennsylvania Railroad, National City Bank, Metropolitan Life Insurance, or the electric light and power giants, each controlling over a billion dollars of capital, employing tens of thousands of workers, and selling their products or services to millions of customers? Do these large units fit into a system where economic activity is guided and controlled by the impersonal forces of the market place, which no one man or group of men can control, but which in turn controls or guides the economic activity of all? Are the statistical findings of corporate size and concentration in the United States which for the past twenty

years have both enlightened and aroused controversy, of great social significance? Do we suffer from the "curse of bigness," to borrow the title of a thought-provoking book by Justice Brandeis? Are we reaching the latter stages of industrial development which to the orthodox Marxist are characterized by such increasing concentration that a few giant monopolies dominate all economic activity, exploiting the worker and public alike and thus paying the way for a socialist revolution which is the inevitable next and final stage of capitalistic development? Is the free enterprise society to commit suicide by making inevitable more and more government controls over business and thus inviting socialism? Or has bigness made possible more efficient production, higher standards of living, more leisure and human improvement, and so been a benign and helpful development? Such are some of the searching problems that loom on the horizon as one approaches the topic of business growth. The subject will be discussed here from two points of view: private profit potentialities and social policy.

The business aspects of corporate growth and expansion center around the profitability of increased size of the business firm. We are not primarily concerned with the size of the individual plant unless the firm has only one plant and the firm and plant sizes become identical. This distinction is important because many controversies about size confuse the two concepts. Arguments in favor of a large firm are sometimes advanced which are basically arguments for economies of size in the individual plant or factory, such as specialization of tasks and the use of costly but highly efficient machinery, production-line techniques, and by-products. Large firms may maximize these economies by operating large plants, or they may expect economies to flow from the operation of a large number of small plants. A United States Steel Corporation or a Ford Motor Company may have a limited number of large and highly efficient plants. A Great Atlantic and Pacific Tea Company or a J. C. Penney Company may have thousands of small or medium-sized stores. Both groups expect to get the economies of large firms, such as more efficient management, better utilization of the services of highpriced executives, better facilities for purchasing, selling, financing, and technical development, discounts on quantity purchases, economies in advertising, spreading sales costs over a large volume of products, savings in transportation costs, advantages in hiring labor, full use of patents and other exclusive legal rights, and better access to the capital markets; but only the former group can expect great advantages to flow from the size of the individual plant.

In addition, some firms may attain such size that they have a large measure of monopoly power which permits them to buy and sell at greater profit than would be true if competition were present. It cannot be too strongly emphasized, however, that neither largeness in scale of production nor largeness in firm size is synonymous with monopoly, and that advantages of size are not dependent upon the achievement of monopoly.

Devices for Expansion.—Growth in size may take any legal or organizational form. If we exclude informal cooperation among otherwise independent concerns through such devices as interlocking directorates, gentlemen's agreements, communities of interest, or pools, there remain a number of ways in which a business unit may expand the scope of its operations. The most common of these methods are internal growth, merger or consolidation, control through stock ownership by the holding company or the trust, and control and operation under a lease.

Internal Growth.—Expansion through internal growth is the normal and most common device for expansion. Successful firms find it necessary to expand their plants to meet a growing demand for their products. If they are small it is likely that their growth will be limited by their capacity to finance expansion through the reinvestment of earnings. As they grow larger they may still depend mainly upon internal sources, as did, for example, virtually every automobile manufacturing company, or they may find it possible to tap external sources by the flotation of an issue of bonds, preferred stock, or common stock, either on a local or regional basis. Continued growth in sales volume and earnings and a gradual seasoning of the early security issues will establish a market which will be more and more receptive to new issues. Marketwise the company will be estab-

lished. Yet it will usually plow back at least a part of its earnings each year. By this means it can meet some of its normal growth requirements, conserve its credit, and await favorable market opportunities to sell additional securities. Moreover, by plowing back equity capital it avoids debt obligations that may prove embarrassing, particularly if its earnings are cycle-sensitive, and it incurs none of the costs of registering and floating a new issue. Nor does it risk loss of control through the issuance of new voting stock. Should stockholders wish some visible (and cashable) evidence of their periodic "involuntary" investment, stock dividends might be paid.

If the corporation finances its growth through the sale of new securities it will, of course, be expected to preserve a sound capital structure. Bonds will be easier to sell than when the corporation was first promoted, but prudence may caution against their use. However, the corporation must accept market conditions and cannot always attain the ideal capital structure. Within reasonable limits of earning power and working capital position, the issuance of bonds at attractive prices may be preferable to the sale of preferred or common stock at low prices. It is legitimate to trade on the equity, but never to endanger the solvency of the enterprise in the lean years that test the soundness of the financial plan. If expansion can take place only by disregarding "conservative" finance it might be better not to undertake it, or at least to postpone it until the appropriate kind of capital is available.

Consolidation or Merger.—Sometimes the scope of operations is greatly expanded overnight by the fusion of the properties and liabilities of two or more companies. After a series of preliminary discussions directed by an outside promoter or by the managements of the individual concerns, a decision is reached to unite the properties lock, stock, and barrel. Each company presumably brings to the union some sources of strength that inhere in an established and going concern, and all are expected to profit from their combined strength. The fusion may result in the formation of an entirely new corporation that owns all the assets and is liable for all of the obligations of the component

companies. This is usually known as consolidation. If one of the companies survives and absorbs the others, it is usually known as merger. However, these terms are likely to be used interchangeably to designate the combination or the merging of the physical properties of two or more companies.

The actual process of purchase may consist of a vote by the stockholders of the selling corporation to sell all the assets to the acquiring corporation subject to certain liabilities. If the purchase price is paid in cash, the selling corporation will usually distribute the cash among its stockholders and dissolve. If the purchase price is paid in the stocks or bonds of the acquiring company, they may be held or distributed among the stockholders of the selling company, which is then dissolved. The process of merger is frequently simplified by the exchange of stock (or bonds) of the buying company for the stock of the selling company. After the transfer of assets the selling company is dissolved. Sometimes it may be kept alive as a nominal entity if it possesses a charter with valuable privileges, as do many railroad corporations, even though, except in name, the property is owned and operated by the buying company.

Fusion is the most thoroughgoing method of combination, but it is also the most difficult and expensive. It is difficult because a small minority of stockholders, sometimes dissenting in order to be "bought off," can block it, if the charter or state statute requires unanimous consent to sell the assets. The sale of assets is usually authorized by something less than 100 per cent of the voting stock, but even if the necessary majority votes in favor of it, the dissenters may institute court action to halt the sale on the ground that it is inequitable to them. Sometimes the motive is to force a better settlement out of court, which may be less expensive than the costs of litigation and delay. In striving to protect the legitimate interests of each stockholder and his right to an accounting and to fair treatment, the law opens the door to this kind of legalized "blackmail" which thwarts the will of the vast majority of the shareholders and discourages merger.

Another difficulty with merger is that unless the buying corporation can pay for the property in its securities, it is faced with the necessity to raise cash equal in amount to the entire value of the property (exclusive of the debt which it assumes). Frequently this is much more than can be spared from working capital and the firm is faced with a major financial problem. If the security market is not receptive to a new issue of common stock and existing stockholders are unlikely to buy it by exercising their rights, the alternative is to saddle the corporation with senior capital charges; or if preferred stock or bonds cannot be sold to advantage because of market conditions, a bank loan might be arranged. Here, however, the company would face restrictive loan provisions limiting its right to pay dividends except from future earnings or from future working capital accumulations, and a slight reversal in business conditions might bring these into play. The result to the corporation stockholders might be disastrous. To finance asset acquisitions that can be paid for only over a period of years by bank borrowing (even by term loans) is to assume considerable risk and to violate the rules of sound finance.

A third impediment to fusion is the difficulty of completely integrating the operations of previously independent concerns. From afar it often looks as if the parts fit into a pattern that is beautiful to behold, but physical facilities and personnel that have been devoted to a particular purpose in a particular environment sometimes are not as plastic as had been supposed. Irreconcilable conflicts arise. Operating economies fail to materialize. Policies proven successful for a small concern do not fit the needs and conditions of a large one, and mediocre results or even complete failure are not unknown.

Yet acquisition of the assets of one corporation by another is going on continuously, particularly in the prosperity phase of the cycle, when opportunities arise to increase profits by acquiring the property of a supplier of raw materials, as automobile companies have bought small sheet steel mills, or the property of a processor of the product, and as copper-mining companies have acquired tubing, rod, and wire mills. Or a company may acquire other units of the same kind; for example, one steel company may acquire another steel company making the same product. Or it may acquire a concern that sells its product to the same market; for example, the manufacturer of automobile

clutches may acquire a concern making carburetors, or a food company making breakfast food might acquire one making coffee. These are known, respectively, as *vertical*, *horizontal* and *circular* combinations and do not necessarily involve the complete merger of assets. Different spheres of business activity seem to have developed their own forms of expansion. Merger is common among corporations engaged in manufacturing, trade, and banking. It is much less common in railroads, where the lease and stock ownership are typical, or in public utilities where the holding company predominates.

The Holding Company.—In contrast to consolidation or merger is the simpler and less expensive device of buying a controlling interest in another corporation. The economy of capital is obvious, particularly where the company to be acquired has a large proportion of its capitalization in the form of nonvoting preferred stocks and bonds. Technically, the acquisition of 51 per cent of the voting stock is necessary to elect all of the board of directors (or a majority in the case of cumulative voting) and so control the policies of the acquired corporation. Actually, if the stock is widely held, working control by a concentrated ownership of a minority of the stock is possible. In case of a proxy contest, however, control might be lost if only a minority of the voting stock is owned. Moreover, since the subsidiary corporation remains in existence as a separate concern, its directors are by law and ethics bound to conduct its operations for the benefit of all its security holders, and not for the sole benefit of the parent company. Therefore, the more stock that remains in the hands of the public, the more restricted is the parent company in using the resources and management of the subsidiary for the parent's benefit.

Where there is no essential conflict between the interests of the subsidiary and the parent companies, however, control through ownership of voting stock is entirely feasible. Not only does it avoid the obstacles that may hold up outright merger, but it avoids the necessity of obtaining the consent of even a bare majority of the stockholders. Control can be obtained by purchase of the stock in the open market, although more frequently it is obtained through negotiations with leading stockholders and/or the management.

In addition to economy and expediency, control through stock ownership has other advantages. The parent company insulates itself against the debts or other liabilities of the subsidiaries. If the subsidiary is unprofitable it is possible to dispose of it easily, quickly, and with limited loss.

The use of the holding company preserves the identity, good will, and operating organization of the subsidiary. It is the most feasible device for controlling corporations which must be incorporated in the state in which they operate (as with public utilities), and which have valuable franchise rights. Moreover, it facilitates the regulatory process where the regulatory authority ends at state lines and all property in one state can be owned by a separate subsidiary or subsidiaries. Otherwise the parent corporation would be subject to regulation by the authorities of every state in which it carries on operations.

On the other hand, the costs of sustaining and operating many separate corporations are incurred and unless care is exercised, duplication, overlapping, and wasteful administrative expenses may creep in. Separate reports must be filed by each corporation. Each will have to pay annual franchise taxes and each must maintain at least a nominal staff, although by using the same officers this can be done at small cost. Holding companies must, at the present time, pay the corporate income tax on 15 per cent of the dividends they receive from their subsidiaries and are subject to a small penalty tax if they file consolidated income tax returns. But subsidiaries may shield the entire corporation from heavy taxation by some states in which it does business because those states may tax only the subsidiary and not the entire concern.

Bonbright and Means ¹ suggest that the holding company and trust may be vulnerable to antitrust prosecution. Outright merger may be desired for operating economies or other reasons, but control of a competing company through stock ownership has long been a popular device for suppressing competition or

¹ J. C. Bonbright and G. C. Means, *The Holding Company* (New York: McGraw-Hill Book Co., Inc., 1932), pp. 44-51.

creating monopoly. The Clayton Anti-Trust Law specifically prohibits stock ownership with this intent and so makes all stock acquisition by holding companies suspect if competition is thereby lessened. Moreover, if the corporation gets into financial difficulty, the separate subsidiaries might be split off in reorganization.

Finally, one of the great dangers of control through stock ownership—in particular by the holding company—is the open invitation to trade on the equity to a dangerous extent by borrowing money to buy the common stock of subsidiaries. Many public utility companies and one railroad holding company system (the Van Sweringen-Allegheny Corporation system) carried this to ridiculous extremes during the 1920's. A holding company would sell its own senior capital securities (bonds and preferred stocks) and perhaps a minority of its common stock. With the proceeds it would buy up the common stock of operating companies. Thus, in effect, the purchaser of the holding company securities put up most of the money by which the holding company bought the controlling stock of the operating companies. If the owners of the majority of the stock in the holding company did not want to tie up their capital, even to that extent, they could organize a second holding company to hold 51 per cent of the voting stock of the first holding company, selling its own nonvoting securities to the public to raise most of the necessary capital. If they wanted to decrease their small but controlling investment in the second holding company, they could organize a third holding company to hold the controlling interest in the second, and so on. In extreme cases half a dozen or more layers of companies would be sandwiched in between the numerous operating companies at the bottom and the top holding company of these "pyramided" holding company structures.

Two undesirable results followed. First, the solvency of the holding companies and the worth of their bonds and preferred stocks rested on the residual (common stock) earnings of the operating companies. A small decrease in the earnings of these operating companies would result in a failure to meet preferred dividend or bond interest requirements of the holding companies,

and financial failure of the top companies became almost inevitable. This became all too apparent in the depression following 1929. In the second place, it permitted a few stockholders with relatively small capital to control the top companies and so control the entire system, with opportunities for lucrative positions and favorable contracts. In other words, it became a powerful engine for separating those who put up the money from those who had control.

These and other holding company "abuses" in the utility field led to drastic legislation in the form of the Public Utility Act of 1935. It would be absurd, however, to conclude that pyramiding is an inevitable result of the holding company. On the contrary the overwhelming majority of the holding companies are not pyramided at all, or are not more than two "layers" deep.

The Trust.—Historically the trust is said to have originated with the organization of the Standard Oil Trust in 1879, which combined some forty corporations and partnerships into one trust representing nearly all of the oil-refining capacity then in existence. Stockholders in each of the constituent companies exchanged their stock for the shares of a trust which was established for the purpose of holding the shares of the oil companies. The affairs of the trust were administered by a group of nine trustees, and the trust was to remain in operation until twentyone years after the death of the last surviving trustee. Thus the trustees held all the stock, or a controlling interest, in the separate companies and could manage them so as to pursue a uniform, noncompetitive policy. The stockholders held trust shares which gave them an interest in the profits of the entire trust, not just those of the company whose stock they had surrendered. It was much as if stockholders had exchanged their shares for the shares of a holding company, the difference being that the holding company is a corporation with power to own stock in other companies, while the trust is organized under the common law by mutual agreement rather than under a corporate charter.

The trust at the time seemed to answer the need for a more permanent method of controlling the affairs of several corporations. Informal arrangements, such as gentlemen's agreements and pools, had been resorted to with frequency after the Civil War to suppress competition, but they were very unstable because there was always a temptation for some members to increase their profits by selling at reduced prices or otherwise violating the agreement. Since these agreements and pools were contrary to the public interest, they were unenforceable at law. Holding company powers were not generally granted under state corporate laws at that time, although a number of corporations, especially railroads, had been given the power to own stock in other companies through special legislative charters granted to them in earlier years.

Other trusts, such as the Cottonseed Oil Trust, the Linseed Oil Trust, the National Lead Trust, the Distillers' or Cattle Feeders' (Whiskey) Trust, and the Sugar Trust, followed the lead of the Standard Oil Trust in the 1880's. However, adverse court decisions, particularly in New York in the North River Sugar Refineries case, 24 N.E. 834 (1890), to the effect that the trust is a sort of partnership which a corporation may not join under penalty of forfeiture of its charter, because to join is beyond its charter powers, chilled the ardor for the trust form. Two years later the Ohio Supreme Court in a similar suit brought against the Standard Oil Company of Ohio reiterated the opinion that to join a trust is an ultra vires act of the corporation, and held further that since the purpose of the trust was to create a "virtual monopoly" which was contrary to public policy, the association was void. Here the charter was not forfeited but the company was ordered to withdraw from the trust. Thereupon the trust was dissolved. The death-blow to the trust device had been delivered.

Just a few years before, in 1888 and 1889, New Jersey had opportunely amended her corporation laws by permitting New Jersey chartered corporations to own stock in other companies if their charters so specified. Most of the trusts hastened to incorporate as holding companies in New Jersey. The transformation was relatively simple. From an economic or operating point of view little was changed; the trust simply donned new legal clothing. The constituent companies were still con-

trolled by stock ownership, but the public now held shares of holding company stock rather than trust shares. The *formal* legality of the holding company, however, did not protect it from prosecution for unlawful actions; and in 1904 the Supreme Court ruled that the Northern Securities Company had violated the Sherman Anti-Trust Act.

Other states hastened to amend their corporation laws to permit holding company powers and some states like Delaware. became favorite states of incorporation. In time it became as easy and as inexpensive to organize a holding company as to organize an ordinary business corporation, with the result that corporations that are primarily operating companies have been able to control some subsidiaries by stock ownership, and there have also emerged pure holding companies which were formed in order to own voting stock in other corporations for purposes of control over a long period of time. In this respect the holding company differs from the investment trust which is also a corporation whose assets consist largely of the stocks (and sometimes bonds) of other corporations. However, the investment trust buys these stocks for purposes of investment, not of control, and seldom, if ever, owns enough stock in one corporation to control it. It also has no long-term interest in the companies whose stock it owns, since it wishes to buy and sell stocks freely to take advantage of market conditions.

The holding company has supplanted the trust as a device for expanding the business of a single corporate unit. It has a number of advantages. It is easy to organize, it is adaptable, and it is very widely used in modern economic life. It also harbors some risks and possibilities of abuse, both from the private and social points of view.

The Lease.—A device for the unification of the physical properties of one or more business units without any financial burdens of ownership is the lease. Corporations, as individuals, sometimes find it to their advantage to use the property, legally owned by others, by leasing it. We have already seen how railroads use rolling stock while the legal title to it is vested in a trust company for the benefit of the holders of equipment trust

certificates. But here the eventual purpose is ownership and the rental payments are in fact installment payments on the purchase of the equipment, which eventually becomes the property of the railroad when payments are completed.

Where one railroad wants to operate the trackage or right of way of another railroad, however, the ultimate objective may or may not be ownership and the rental payment usually covers only a payment for the current use of property, not for its purchase.

Consolidation through lease has played a large part in building up present-day railroad systems. Under such an arrangement a railroad company leases all of its property to another railroad company. Sometimes the lessee and lessor railroads have had separate and independent backgrounds, but sometimes the lease arrangement is made between a parent company and a subsidiary especially organized to construct an extension. Here the lease merely adds one more bond to tie together a parent and a subsidiary already closely linked by stock ownership and interlocking managements.

We have already seen how the security holders of companies leasing their properties to another commonly exact a guaranty agreement under which the lessee company agrees to pay the interest on outstanding bonds and a stipulated rate of dividends upon preferred and common stocks. These lease arrangements are usually for a long term, the typical duration probably being from 50 to 99 years, although some run to 999 years. Thus the lease, although not involving an immediate outlay of capital, does impose a fixed charge that is as enforceable at law as any creditor's claim and so might precipitate failure. This was not always true. Early railroad leases sometimes made rental payments contingent upon gross or net earnings, with fixed liability absent. With the development and consolidation of modern railroad systems, fixed rental lease contracts became more common. and it is now usual to include rental requirements in the fixed charges of the parent companies. The lease, in effect, became a device whereby the property was acquired entirely by fixed charge obligations, thus exaggerating the possible profits and losses of trading on the equity.

In many cases, however, this burden of fixed charges was more nominal than real. Over the years it has been a practice of most parent companies to buy up the guaranteed bonds and stocks of their leased subsidiaries. Thus the New York Central Railroad owns practically 100 per cent of the stock of the Michigan Central upon whose stock it guarantees a yearly dividend of 50 per cent, and nearly all of the preferred and common stock of the Cleveland, Cincinnati, Chicago, and St. Louis ("Big Four") upon which it guarantees dividends of 5 and 10 per cent respectively. The Pennsylvania Railroad owns about 90 per cent of the stock of the Pittsburgh, Fort Wayne, and Chicago Railway Company, whose property constitutes the main line trackage for the Pennsylvania Railroad west from Pittsburgh into Chicago. A dividend rate of 7 per cent on the stock is guaranteed by the parent company. Thus stock ownership, in effect, not only cuts the burden of fixed charges and so helps to preserve financial strength, but also avoids the threat of disruption of traffic routes, built up over the years, when the lease expires. Practically all railroads that have developed main lines and strategic parts of their systems through leases have solidified their control over leased lines by persistent programs of stock purchase. To the extent that the payment of guaranteed dividends was only taking money out of one pocket and putting it into another, they were able to ride out the depression of the 1930's without resort to bankruptcy. Where, however, substantial amounts of guaranteed stock were in the hands of outside investors, as was true of some of the New Haven issues, guaranteed interest and dividends helped swell the burden of the fixed charges that eventually brought on failure.

The great advantage of the lease is that property can be taken over quickly and with little capital outlay. It avoids the legal obstacles that may be thrown in the way of outright merger, and yet it permits the lessee corporation to operate property as its own. The stockholders of the lessor corporation are given a fixed rather than a contingent claim to earnings, and the bondholders may welcome the guaranty of a stronger corporation. The corporate entity of the lessor corporation is kept alive, together with the franchise and other rights that it possesses. The

intercorporate relationships are not as permanent as in the case of merger, particularly if the lease is for a short term.

On the other hand, the lease raises many problems. Careful provisions must be made covering the maintenance and improvement of the property and the rights of the parties if and when the lease is terminated. The expenses of keeping an additional corporate entity alive must be borne. Unless the duration of the lease is short, the commitment is not easily reversible if it proves to be unprofitable. If it is profitable, funds must usually be expended to buy up the voting securities to solidify control and ensure permanence of the arrangement. Moreover, in the absence of the acquisition of guaranteed securities, fixed charges may be dangerously high relative to the earning power of the property acquired. Therefore economy of capital, important as it is, is likely to be true only in the early years.

Although widely employed in the railroad field, the lease has played an insignificant part in the unification of properties of other types of corporations. Some exceptions are to be found in manufacturing. Many munitions, aircraft, steel, aluminum, synthetic rubber, and other plants built for war purposes and owned by the federal government have been leased by privatemanufacturers, frequently with the option to purchase. However this is likely to be a transitory phenomenon. Some corporations making patented machinery have followed a policy of leasing rather than selling some of their machines. This is particularly true of the United Shoe Machinery Corporation and International Business Machines Corporation. Buildings are sometimes built on land that is leased for a long period of time rather than owned in fee. Retail stores commonly rent their store buildings (sometimes from an associated realty company) rather than own them. By cutting down initial capital requirements this device may facilitate expansion but it is not a method of combination and unification in the way that railroad leases have been.

Economics of Expansion.—Devices for the expansion and combination are only means to an end. But what is the end? Why have growth and expansion been so characteristic of the

typical business in many segments of our economy—for example, railroads, public utilities, and some manufacturing—while the size of the typical firm has remained relatively small in agriculture, retail trade, and the service industries? No doubt some units grew as our national economic life, population, cultivated area, and national income grew, but why not the others? It is commonly supposed, and likely true, that the explanation of bigness in business must be found in human ambition. Men desire to have the approval and admiration of their fellow men. Therefore they strive for the things that bring approval, and their ambitions frequently find expression in business policies. Size is commonly associated with success, and one's position is enhanced if he heads a \$100,000,000 corporation rather than a \$100,000 concern. Ambition, vanity, inventiveness, and boldness are human qualities and the desire for personal distinction and social approval may have motivated some business managements to undertake expansion.

But after these psychological and personal factors have been given their due, the most important factor underlying business expansion is the desire for greater profit, for in the long run success rests upon the profitability of operations. Hence in a free enterprise society the validity of expansion must be judged by the profits it creates, since unprofitability is not only wasteful of the capital of individual investors but socially wasteful as well, because it indicates a misuse or waste of resources that could be used to greater social advantage elsewhere. The failure of selling prices to cover all economic costs, including the going market rate of return on the capital, labor, and natural resources furnished by the owner, penalizes the misuse of resources and tends to divert them to uses having a value at least covering costs. Likewise if large profits (above the "normal" rate) are being made in a particular industry, it is to the advantage of society to have entrepreneurs expand production in that industry until prices and cost of production are brought into line. Of course the promoter or entrepreneur does not care whether he serves society in this kind of expansion or not—he looks only for increased profit—but this profit can come only from doing what society wants done. There is one exception to this principle. If the purpose of expansion is to obtain monopolistic control, private profits may be realized without corresponding social gain and it must be recognized that in some cases the real motive is to restrict or eliminate competition rather than to increase profits through expanded volume, the use of better technical methods, and the realization of the economies of purchasing and selling. Whether the profits of monopoly or the economies of size (of plant and of firm) are realized is, of course, another story.

But assuming that the drive for profits motivates most plans for expansion, in what sense do profit calculations enter? Certainly profits are not synonymous with mere physical volume, since a large volume of product may result in a large loss rather than a profit. Nor do profits mean a large dollar volume of sales, since this may bring loss rather than profit. Nor do profits mean that the rationally minded management will strive for the greatest profit per unit of product (or margin of profit), or even the largest profit per dollar of equity capital. Rather, each rational entrepreneur will follow the objective commonly attributed to him in economic theory—the maximization of total net profits after covering all costs including a return on the factors the entrepreneur has furnished.

How can profits in this sense be maximized? Will it pay to invest additional capital if by doing so output is expanded, the dollar volume of sales increased, the margin of profit changed, the rate of return on total invested capital altered? What combination of these spells successful (profitable) expansion? It is obvious that if expanded physical volume of output results in a decreased dollar volume of sales and a decreased rate of profit per dollar on smaller sales, total profits are actually reduced and the additional investment has not been justified; here expansion has resulted in a negative profit. On the other hand, increased volume, dollar sales, profit per dollar of sales, and profit per unit of investment would indicate a profitable and wise expansion. Few cases are found at these extremes. What of a middle case, where physical volume and dollar sales increase but profits per dollar of sales and per dollar of invested capital decline? Would expansion be wise in such a case? No dogmatic answer can be given; such a condition may make expansion profitable or unprofitable. A decline in the profit margin (per dollar of sales) may not decrease total net profits if the dollar volume of sales increases sufficiently. In fact, this was the very basis upon which expansion in some fields, notably chain grocery stores, took place. Small unit profit and high turnover may be the secret of profitable expansion, but a constantly declining margin of profit is one of the danger signals that should be watched since the time may come when volume will no longer offset it.

It is not so easy to see how expansion can be profitable if it results in a reduced rate of return per dollar of invested capital. In fact grocery chains, variety stores, and other corporations which expanded during the decade of the 1920's were criticized for unwisely retaining their stockholders' earnings or selling new stock for purposes of expansion. Was this criticism warranted? Let us take an example. Suppose a company operating a chain of retail stores has an invested capital of \$20 million represented entirely by common stock. Upon this it earns an average annual rate of return (after all costs except the normal return on stockholders' capital) of 30 per cent. Suppose it decides that it might be profitable to open some new stores, and as a result the rate of return declines to 25 per cent. Was this an unwise expansion? It would appear that a reduction in the rate earned on the stockholders' investment would condemn such a move, but such appearances are deceiving. The answer is to be found in resulting total net profit. Let us suppose that the expansion cost \$10 million, which was raised by the sale of new stock, and that the market rate for equity capital for such chain store concerns was 10 per cent. The resulting total net profits of the firm before and after expansion can be stated:

```
Total profit = $20,000,000 × .30 = $6,000,000

Less market rate on stockholders' capital = 20,000,000 × .10 = 2,000,000

Total net profit = $4,000,000

After expansion:

Total profit = $30,000,000 × .25 = $7,500,000

Less market rate on stockholders' capital = 30,000,000 × .10 = 3,000,000

Total net profit = $4,500,000
```

Before expansion:

It is clear that total net profit was greater after expansion than before despite the decreased rate of return per dollar of total investment, and the expansion was justified. A short-cut way of reaching the same conclusion is to compare the additional profit with the cost (going rate) of the additional capital, or the marginal return to capital required for expansion with the marginal cost of such capital. In the illustration the marginal return to the \$10,000,000 of added capital is \$1,500,000 (\$7,-500.000 - \$6,000,000), while the marginal cost of that capital was \$1,000,000 (\$10,000,000 \times .10), a net increase in total profit of \$500,000. Or, more simply, the new capital yielded a return of 15 per cent as compared with a cost of 10 per cent. This marginal principle is a helpful guide since it centers attention at the proper place. Averages are tricky and likely to be misleading, but management will not be misled if it accepts the marginal principle and uses it as a guide. Expansion is profitable as long as the added returns on capital are greater than the added cost of that capital. As long as marginal returns are greater than marginal costs, total net profits are bound to increase.

Certain corollaries to this profit guide to expansion are obvious. Whenever the expected return on additional capital is large, there will be a tendency for business firms to undertake expansion. Sometimes this expectation may be held by only one industry or by one firm in the industry. Business firms and industries, like human beings, are commonly said to have a normal life cycle. They are born, move through an early period of experimentation and development, experience a period of rapid growth and vigorous expansion after which the rate of growth begins to diminish, maturity develops, old age sets in, and senility and decline ensue. The duration of the cycle may be a century or more (the railroads reached the stage of maturity after a century), while others may complete the cycle in one or two years (the miniature golf craze) or in a decade (radio-set manufacturing in the 1920's). Others seem to stay in the growth stage for several decades (electricity supply and cigarette production are examples). During these periods large amounts of capital are called for.

Expansion and the Business Cycle.—There are times when all industries and firms, old and new alike, seem to be convinced that there are opportunities for profitable development. These times are likely to coincide with the prosperity phase of the business cycle, when large sales, good profits, and general optimism support each other and lead to programs of plant construction and working capital growth which make up the "capital formation" that spells economic prosperity and is essential to the full employment of our resources. These periodic upsurges of construction and expansion are important characteristics of our economic life and give rise to the problems of economic insecurity associated with the fluctuations they engender. However, our present task is to see them as problems of business—not social—policy.

Whether due to growth elements or to business prosperity, the "marginal efficiency of capital," to borrow a phrase from Keynes, is higher at some times than at others, and then the rate of return becomes sufficiently high to make additional capital investment attractive to existing firms. The prosperous decade ending in 1929 was such a period. Although at the time the political party out of power dubbed it a period of "profitless prosperity." it was in fact one of the most profitable periods in our history, not only to the entrepreneur but to workers and to considerable segments of agriculture alike. At least it was so compared with the stagnant decade that followed it, when the outlook for profits was dim and business expansion an exception rather than the rule. The profitability of the 1920's, coupled with the New Era delusion that there would no longer be business depressions and that future profits would eclipse those of the present and past, provided an ideal environment for corporate expansion. Present and expected returns to capital were high, business optimism was infectious, and only a few dissenting voices were heard from such industries as New England textiles (woolen and cotton) where changed consumers' habits, competition from new mills in the South, and new fibers led to decline rather than expansion.

That business expansion should take place predominantly during the prosperity phase of the business cycle is not a mystery.

It is recorded in the history of business growth and combination during the late 1890's, the early 1900's, and again during the 1920's. Prosperity provides the promise of profitability, but it also provides a financial environment in which capital, particularly equity capital, can be obtained at the lowest rates of any stage of the cycle. Prosperous periods are almost invariably periods of high prices for common stocks, both historically and with respect to earnings and dividends. While it is a common, though frequently erroneous, rule of thumb that common stocks of industrial corporations sell for "ten times current net earnings," which means that the earnings yield is 10 per cent, it is not uncommon for the price of the stock to double relative to earnings in times of prosperity. Thus the high stock prices in such years as 1929, 1937, and 1946 were commonly about fifteen to twenty times current earnings for well-established leading industrial corporations. In other words the cost of equity capital, measured by earnings, was reduced to between 5 and 7 per cent. and the dividend yield went down to 4 or even 3 per cent because only a part of the earnings was paid out as dividends. Even if the marginal profitability of capital investment did not increase, the reduction in the cost of capital, particularly equity capital, would provide a margin between the return and the cost of capital and so provide a powerful impetus to expansion.

A strong stock market stimulates corporate expansion in another way. It provides incentives for professional promoters, investment bankers, and corporate managements to seek out opportunities to control or combine with other business interests for the sake of the profits that can be made from promotion and stock flotations. Promoters' and bankers' profits have long been recognized as a motivating force in the movement toward combination which is characteristic of prosperous years.

Expansion After World War II.—Sometimes the cost of capital from some sources may be high while that from other sources is low. Here the marginal principle gives no sure answer since it comes into conflict with the objective of maintaining a sound and conservative capital structure. In 1948 we experienced a period of business expansion which in dollar

amount exceeded that of any similar period. Corporate profits reached a new high of \$17 billion in 1947 and \$20 billion in 1948, and the profit outlook was generally good as full employment at wage levels double those before the war, large profits, unprecedented farm incomes, and tremendous accumulations of spendable liquid assets built up during the war made effective huge current demands for almost every commodity and assured that markets for most goods, durable and nondurable, would be good until the huge pent-up demands had been satisfied.

The postwar "marginal efficiency of capital" seemed to be high, but the feasibility of some optional expansion came more and more into question as stock prices refused to rise with rising earnings. As a result equity capital became costly. Leading stocks sold on a 10 to 12 per cent earnings basis and about a 5 per cent dividend basis, instead of at half these rates as in previous periods of prosperity.

Fortunately other sources of capital were available to those who could safely use them. The interest rates on bonds (bond yields) were near their all-time lows, partly because of U. S. Treasury debt management policy. Corporations could issue bonds on a 3 to $3\frac{1}{2}$ per cent basis as compared with 5 to 6 per cent during the prosperous 1920's. Banks were eager to make loans, both long and short term, at interest rates that were historically low; otherwise their funds would be tied up in cash or low-yield government securities. Easy credit, then, flowing from debt financing during the war and from a deliberate Treasury-Federal Reserve policy after the war, made debt capital cheap.

The most important sources of funds to finance postwar corporate expansion were retained profits, depreciation reserves, drawing down of cash assets accumulated during the war, and the expansion of current liabilities, such as accounts payable and federal tax liability. According to Irwin Friend,² manufacturing corporations in 1947 raised \$14.1 billion of new capital, but only about one-tenth of this, \$1.5 billion, was raised by new securities, mostly bonds and preferred stocks; the other nine-

² Survey of Current Business, March, 1948, pp. 10 ff.

tenths came from retained profits (\$6.5 billion), depreciation (\$2.4 billion), sale of government securities owned (\$.7 billion), increase in payables (\$.6 billion), increase in tax liability (\$1.8 billion), and new bank loans (\$1.2 billion). Public utilities depended more upon security (mostly bond) issues and less upon reinvested earnings for their new capital, raising in this way \$1.0 billion out of total requirements of \$2.1 billion, and about \$.5 billion from depreciation, \$.2 billion from retained profits, and \$.2 billion from bank loans. However, conditions were not favorable for stock issues in the utility field and the proportion of stock to total issues was considerably lower than in the prosperous period of the 1920's.

In short, some of the postwar wave of expansion and improvement of physical plant was in the main defensible on the marginal principle only because sources of capital other than the sale of new common stock were available. But even these sources have their drawbacks. Expansion through the sale of new senior securities brings progressively more and more risks to the owners of the business. It can be demonstrated by simple arithmetic that potential profits can be almost infinitely high if it is possible to obtain capital at a rate of return which is less than it will earn. On that basis the possibilities of expansion may have no near mathematical limit. But no concern is going to base its decisions on arithmetic alone. The increasing hazards incurred as the equity gets thinner and thinner may more than offset the added chance of gains; hence expansion by the use of senior capital may stop far short of the maximum theoretical limit.

Moreover, in applying the marginal principle care must be taken to avoid the illusion that funds coming from internal sources, depreciation, depletion, and retained earnings are without cost. Every student of economics knows that true costs contain implicit items such as the return on owned capital, and in economic calculations these costs must be covered or the project is economically unsound. Managements, therefore, must not consider internal sources of funds as costless. There is no justification for retaining funds in the business if they cannot earn the returns that the same funds would earn in alternative uses. Perhaps management actually makes such estimates

of returns and costs of capital in only a rough way, but it must make them or fail in its responsibility to stockholders.

Limitations on Use of Marginal Principle.—Even where the cost of additional capital can be objectively determined in the market place or otherwise, decisions to embark upon programs of expansion involve more complicated considerations than might be implied in the marginal guide to the maximization of profit. In the first place, how can the profitability of expansion be determined with any degree of accuracy? Plans must be based upon anticipations, and anticipations upon predictions; but prediction is one of the most difficult of all the economic arts. In some cases the profits to be derived from a course of action are so uncertain as to be subject to no accuracy of prediction. Therefore the marginal principle must be based upon hoped-for or expected profits rather than demonstrated ones. In fields such as public utilities, there is likely to be a fairly high correlation between total capital and total net profits, but only a crystal ball can foretell the profits that will flow from a new play or a new style in women's jewelry. Nevertheless, such estimates or guesses are the stuff of life in an individual enterprise economy, and the marginal principle remains valid even though the accuracy of prediction is less than perfect.

But, it might be said, if prediction is inaccurate, history is not, and we can at least determine in retrospect if a given increase in investment was profitable. Hindsight has an accuracy that foresight lacks. This approach raises the question: Even if we know what happened to total profits after the investment of additional capital, do we know that it was because of the addition? We cannot be sure. Our conclusions cannot be accurate because conditions other than size are constantly changing. Demand for the product may increase because people's incomes have increased, or because styles have changed, or because competing articles are scarce. Costs may be reduced because of a fall in the price of raw material, or because new methods of production have been perfected. The margin of profit may rise because competition is less keen or because government sets the price, or for some other reason. These factors, rather than the

increase in investment, may be the major cause of an increase in profit from year to year.

Or take the opposite result. If profits fall after size increases, does it prove that the addition was worse than useless since the marginal return was negative? No one knows, because other things have not remained the same. To find out we would have to indulge in hypothetical estimates of the size of profits if no additions had been made. Unless the old and the new are kept completely separate and are not interdependent, this may prove to be impossible. Perhaps the investment of new capital was completely justified, for otherwise the loss would have been still greater. There comes a time in the life of most business concerns when a large amount of new capital is necessary to prevent decay or disintegration. Manufacturing processes must be changed, new products developed, new equipment installed, new markets exploited, or earning power will gradually vanish. Such new capital may be warranted if profits are not increased proportionately. Like Alice in Wonderland, some concerns must run fast to stand still.

Further issues in the problem of the optimum size of a business come to mind. What are to be maximized, a single year's profits or those over the life of the business? Should a large investment be made now, as in reforestation, in the expectation of high profits sixty years later? Here again it would seem obvious that any policy that emphasized only short-run profits would be shortsighted and unsound. On the other hand, the "long run" may be too long; the persons concerned may all be dead by the time the policy results in high profits. Due allowance must be made for the uncertainties of life, the uncertainty of future economic and political conditions, and above all the preference for present returns. In short, maximum long-run profits may prove to be a good guide only when the future has been discounted adequately for the risks involved.

Involuntary or Compulsory Expansion.—So far we have assumed that corporate managements are in a position to decide whether or not to expand and have a substantial amount of freedom in their choice. After a careful balancing of the forces

working for and against larger profits through expansion, a decision is reached that is wholly voluntary as well as presumably rational. Yet it is not an accurate picture of the nature of all expansion decisions. Sometimes managements' minds are made up for them by forces beyond their control. A large increase in the amount of capital utilized by the business may be made necessary without deliberation about its desirability or a conscious choice being made. Such cases might be termed "compulsory" expansion, and they are by no means rare.

We have already seen how working capital expansion may be forced by a higher level of commodity prices and costs, without any increase in physical facilities at all. Perhaps some, thinking that expansion means only "more plant under the same management," would not call this expansion at all. Yet in meaningful terms of the size of invested capital and in the financial problems it poses, it is expansion and it takes place without calculations of marginal returns and costs.

Compulsory corporate expansion, in the sense of an increase in invested capital that is dictated from the outside, is sometimes caused by changes in technology. New ways of doing things frequently call for the investment of additional capital, even if old and obsolete methods and equipment have not been written off through charges to operations. Additional capital is called for without greatly altering the physical scope of the business—call it expansion or what you will. Buses replace street cars, DC-6's replace DC-3's in air passenger service, high-speed looms replace slower ones—all at the cost of considerable new capital and expansion in investment. And even though the old equipment is written off the books, it does not necessarily mean that cash has been accumulated to finance the new equipment.

Firms that have undertaken to serve a growing market frequently find themselves faced with the necessity to expand whether they want to or not. Public utilities are an outstanding example. By law they are bound to serve all who apply for service and to make reasonable provisions for extending the service to new customers within their service area. Electric light and power companies, gas companies, telephone companies, traction companies, and railroads must increase their investments

(within reason) when the demand for their service increases. Only when it comes to serving an entirely new area is the management entirely free to expand or not as it sees fit. The forced expansion of air-line companies to meet the demands of a rapidly growing volume of air travel in recent years is a pointed example of how a combination of technological developments and increased volume of traffic can present capital-raising problems that nearly floored a lusty infant industry.

Let us take another set of cases in which management has little discretion in the matter of expansion of its capital investment. A rise in wage costs may tip the scales in favor of the use of machinery, particularly if wages have not risen uniformly in all industries and occupations. Costly mining machinery may be economical if miners' wages rise above a certain point. Machine tools that perform several operations automatically may repay their higher initial cost by saving the expensive labor that otherwise would be required. This substitution of capital for labor in some cases may be discretionary; in others competitive forces may literally force the investment in machinery.

These examples are given to indicate that some management decisions to expand are not decisions at all, but are virtually dictated by circumstances. Sometimes a decision would have to be made not to expand, rather than the reverse. A sort of rule of thumb, over-all guess of the profits or losses involved is more typical of the process of reaching decisions in such cases than a close observance of any ritual or single principle. The arithmetic of careful calculation may be correct, but the figures used are likely to represent little more than intelligent guesses about the magnitudes involved.

The Limits of Expansion.—The problem of the optimum size of the business unit has long been of interest to businessmen and economists, and even to reformers and politicians. The latter are quite likely to rank "the concentration of economic control" high among the list of things that are wrong with our economic system; Karl Marx saw it as a forerunner to popular revolution. Hence what could be more logical to save capitalism than to forbid or punish the expansion of a single business unit

beyond a certain size? That, of course, might be done by legislation. But where should the line be drawn? Should it be uniform or different for different industries? Should all areas be included? Or should some, like railroad, telegraph, telephone, and power companies be included, and agriculture, manufacturing, and the retail trade be excluded?

Before we answer, the economist would raise another question. Is bigness economically inevitable? If unhindered by law would concentration grow apace? Everywhere? Is there anything inherent in modern technology or in the economic organization of society that places a premium on growth, expansion, and size? What are the answers?

We might begin by observing the more obvious limits to size, at least in the absolute sense. Sometimes markets are so limited that gigantic size is not possible. It is hard to imagine a River Rouge plant turning out nothing but numbers for houses, or silk hats, or gold-handled canes, or wheel chairs, or surgical instruments; there is not a sufficient number of buyers to make a giant business unit possible, although there may be a single producer who has a monopoly. Or if the total market is not limited, there may be geographical limits beyond which it is uneconomical to sell. High transportation costs may make it impossible to supply such bulky articles of low value as sand, cement, and brick from one central plant. Expansion in such a case would have to take place by the more difficult process of operating or controlling many small plants widely scattereda more formidable managerial feat. Sometimes raw materials are so widely available in nature that it is wiser to build plants near them than to transport the product. This tends to multiply the number of plants and make concentration of operation in a few plants or by one concern owning a large number of plants virtually impossible. Moreover, easy access to raw materials, if combined with easy entry into business because capital requirements are low and processes are not secret or legally restricted by patents, tends to make for multiplicity of ownership.

Aside from these rather obvious cases of the limitation of size, there is no specific "natural law" or other rule to determine the most profitable size. In each industry or even in each firm

there is a tendency for the forces making for profitability of size to come into balance with those making for inefficiency and costliness of size. In some industries this balance is reached when the firm has a large amount of capital at its command, as in steel manufacturing, automobile manufacturing, or cigarette manufacturing, or when the firm is of comparatively small size, as in retail trade, textile manufacturing, and the service industries. Sometimes small concerns and large concerns continue side by side, as in the dairy industry where the tiny local dairyman exists with such giants as National Dairy Products Company or Borden Company. How does one determine at what size the balance will be struck?

Law of Diminishing Returns.—Some find a clue to the proper size of a business in the classical "law of diminishing returns" laid down by economic philosophers a century and a half ago and used by Malthus to explain the miseries of the world. It was observed that population tended to expand while natural resources tended to remain relatively fixed in amount. This resulted in a smaller output per person (total output increased) and so of necessity reduced the standard of living. Thus population expansion was limited by famine, disease, and war. An analogy is said to exist for a business concern. As it tries to expand, it runs into checks and diseconomies. Just as added units of population working with a fixed supply of natural resources increase the output less than proportionately, so added investment in a business unit will yield less than proportionate results. If this is true, nature limits the optimum size of the business firm and the penalty of loss awaits those who defy her.

Does this principle of economic theory give us any help? Probably less than might be supposed, for several reasons. First, the classic principle was concerned with the *physical* product (e.g., bushels of wheat) produced by added workers, while the business unit is interested in maximizing its total net profit in *dollars*. Physical product and dollar product do not always coincide, particularly where the product has an inelastic demand. A restriction of physical output may bring a greater dollar sales volume and much greater dollar profits. This is

sometimes, but not necessarily, the result of monopolistic practices. A competitive example would be wheat farming, where a small crop sometimes sells for more dollars than a large crop. In any case, the entrepreneur is concerned with the profits of his business, not with the real income of society.

A second and more significant difference between the law of diminishing returns and the principles governing optimum business size is the degree of fixity of at least one factor of production. In the production of foodstuffs there is a most efficient combination of labor, capital, and land. As production is carried beyond that point by the addition of more labor and capital to a fixed amount of land, the added product, marginal or average, declines. The crux of the problem is the fixed supply of land. But if an entire society faces a relatively fixed amount of land or other resources, no one business firm does. It can expand by getting more land, more capital, more labor, so as not to change the *proportion* of the factors and so invite diminishing physical returns. In other words, the analogy breaks down because there are no fixed factors in the individual firm, even though the total physical supply of each factor may be limited.

Yet some students have found a limited or relatively fixed factor that governs the profitable limits of expansion for the individual firm. That factor is the capacity of the management. Land can be procured, buildings built, machinery obtained, circulating capital raised, workers hired, but the intangible and vital force called management cannot be expanded in the same proportions. To be sure, more managers can be hired, complicated organizational setups established, lines of authority drawn, staff assistance provided for; but these steps do not necessarily expand management; they may merely make it more tenuous, less responsive, more "bureaucratic," less imaginative, more mechanical, and less "human."

In this limitation of management there may lie some tendency toward "diminishing returns" in the individual profit sense. A. S. Dewing, in his monumental study of seventeen industrial consolidations of the late 1890's, laid their lack of success and need for financial reorganization largely to inadequacies of managements, many of which had been successful in small concerns,

or to the persistence of competition despite efforts to crush it or buy it out.8 Both reasons are of much concern to the student of corporate bigness. The post-mortem studies revealed the following personal causes of failure among these business combinations: (1) diffusion of responsibility, (2) lack of knowledge of individual employees, (3) lack of loyalty of officers and directors, (4) lack of attention to details by higher officials, (5) prejudice of customers against improved methods, and (6) prejudice of customers against "trusts." All, or some, of these human failures were found in consolidations of manufacturers of leather, corn starch, cordage, asphalt, cotton textiles, bicycles, and ships.

Relative Importance of Labor and Capital Costs.—Further study led Dewing at a later date to announce his interesting "law of balanced profitableness," which held that the relative proportions of labor cost and capital cost, respectively, to total cost of producing a product determines whether the proper size of a business is small or large.4 He concluded that if the product is made mostly by labor the proper scale is small; if by capital, large. This hypothesis he found to be confirmed by experience, and two examples were cited. The first concerned a manufacturer of shoes who thought that by building a big modern shoe factory he could multiply the profits he was making as a small manufacturer with ordinary equipment and a small investment per worker. Instead, he went broke. Why? Because his skill in managing a small concern could not be transferred with equal effectiveness to the large. Moreover, flexibility was lost with size and fixed costs increased, thus making failure more likely. Labor had been an important factor in the cost of making this type of shoes. The proper size of the enterprise was therefore small. This principle he found to be implicit in the arrangement of successful shoe companies. The makers of ladies' style shoes and men's dress shoes are usually small and located in New England. On the other hand, the mass production of

³ A. S. Dewing, Corporate Promotions and Reorganizations (Cambridge: Harvard University Press, 1914), pp. 557-566.

⁴ See A. S. Dewing, The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), pp. 864-877.

standard men's, youth's and children's shoes is carried on most successfully in the large factories of mass production centers like St. Louis, Missouri, or Binghamton, New York.

The other example was found in the metal-working industries during World War I, where small plants tried to expand operations to meet the demand of war orders, which looked lucrative. Not having time to increase equipment, they expanded by hiring more labor and working longer hours. But inefficiencies crept in and profits either failed to increase or actually decreased. These firms had run into difficulty because their scale of production should have increased by adding to their plant rather than by adding only labor—i.e. the proper scale of these capitalusing industries was large, and the effort to increase the ratio of labor to capital cost was disastrous.

Whether the principle is correct in theory or fully demonstrated by these examples is a matter of debate. Perhaps the examples showed only that management cannot convert a handmade, style-goods plant into a machine-process plant without penalties. Or perhaps they proved that the "principle of proportionality" (a proper ratio of equipment to labor) applies to all industry. This proper proportion must be kept whether industry is large or small, unless there is a scarce factor. Changing proportions by adding either labor or equipment alone is uneconomic, regardless of the size of the business.

Yet Dewing's "law" may be based on sound logic. If labor cost is large it is likely that the human factor is important; hence the crucial importance of management, which can function most effectively when the plant is small in size. If labor cost is small relative to capital cost, machine processes may replace or control the human element and the technological gains are not more than offset by managerial inefficiency. We get back again to management as a relatively fixed factor and find that we are in danger of running into "diminishing returns" if we add further units of the variable factor, labor.

The idea is stimulating, and probably valid in part, but statistical evidence is conflicting. For example, railroad corporations are large although labor costs make up a large proportion of total costs, while a water works may be successfully operated

by a small concern even though most of its costs are capital costs. These may be extreme exceptions, but others are not hard to find. In manufacturing, the Federal Trade Commission has published information on labor costs relative to sales.⁵ Not all corporations with low labor costs are large, nor are all with high labor costs small. The following are some of the industries that are composed of typically large corporations. Yet labor cost shows a highly variant relationship to sales:

Industry	Labor Cost to Sales
Automobiles	. 17.6%
Cigarettes	. 3.2
Rubber tires	
Tin cans	
Agricultural implements	. 20.5
Steel	

In industries characterized by relatively small corporations the ratio of labor cost to sales also varies considerably.

Industry	Labor Cost to Sales
Cotton manufacturing	. 26.4%
Clothing (men's and boys')	
Printing and publishing (books, etc.)	. 8.5
Machine tools	. 23.9
Lumber	. 30.3
Bakeries	. 13.0
Paper	. 20.4
Silk manufacturing	. 29.4
Furniture	

The above examples, chosen at random, indicate some tendency for high labor cost industries to be small and low labor cost industries large, but the variation is so great and there are so many exceptions that generalization is hazardous. They lend a small measure of support to Dewing's thesis and to the deductive logic that makes ability to manage a limiting factor in expansion.

But labor cost is probably only one of a large number of factors affecting the economics of corporate size. The plain fact is that although much is said about the profitability or unprofitability of size there is no magic device, no secret formula to indicate when a given business is, like the little bear's chair, "just

⁵ Industrial Corporation Reports, Summary, June 20, 1941, p. 20.

right" in size. Nor is one industry necessarily wholly composed of large or small firms. Some are always much larger than others, though not as large as a large concern in another industry. Chain stores like Great Atlantic and Pacific, Safeway, F. W. Woolworth, or J. C. Penney exist beside the hundreds of thousands of tiny independent retail stores selling food, clothing, and variety goods. A giant like the American Woolen Company towers above a host of small woolen and worsted companies with which it competes. Yet the largest are not always the most successful. In the depressed 1930's, many small woolen and worsted mills operated profitably in most of the years, while American Woolen showed a record of a rather consistent unprofitability.

It is not difficult to cite instances where there is weakness. rather than strength, in union. In his study of thirty-five industrial combinations put together in the 1890's and early 1900's, Dewing 6 found that in twenty-two cases the average ten-year earnings after combination were less than the earnings of the plants when they were independent, and that in thirty cases earnings were less than anticipated; in other words, combination and bigness did not improve earning power. A study of consolidations undertaken by the National Industrial Conference Board 7 showed that between 1900 and 1913 the average net earnings on the stock equity of consolidations (from twentynine to forty-eight in number) never exceeded 7.3 per cent (in 1902) and fell to as little as .5 per cent in the depression year 1908. The average rate of return over the period was probably less than 6 per cent and had a tendency to decline somewhat after 1910. Few conclusions can be drawn from this except that industrial consolidations, as a whole, were not highly profitable, but their earnings were fairly stable for industrial corporations.

Statistical Studies of Profits by Size Groups.—During the past twenty years many statistical studies have been made in

The Board, 1929), Ch. 3.

⁶ A. S. Dewing, *The Financial Policy of Corporations*, 3rd ed. (New York: The Ronald Press Co., 1934), p. 748.

⁷ National Industrial Conference Board, *Mergers in Industry* (New York:

attempts to discover whether large or small concerns are more profitable. The results are not wholly revealing, since the companies, industries, and years chosen were different in each case. In some studies the basic data were limited to only a few companies; in others the data consisted of huge aggregates derived from federal corporation income tax statistics. As a result, one can find statistical support for almost any shade of opinion regarding the profitability of size. Much depends upon careful interpretation and a knowledge of the economic and business background from which these statistics are derived. If used carefully they provide us with the best proof that is available. A short résumé of these findings will be given here.

R. C. Epstein 8 found that out of 2,046 manufacturing corporations for the two prosperous years 1924 and 1928, the smallest concerns, those with invested capital of \$500,000 or less, earned over 20 per cent on their total capital, while the giants, those with capital of over \$50 million, earned only 8 to 10 per cent. No size group was as profitable as the smallest concerns.

H. B. Summers 9 studied the earnings of 1,130 industrial corporations over a twenty-year period from 1910 to 1929. The period was long enough to include both good and bad years, but, of course, it excluded the Great Depression of the 1930's. The average rate of earnings on total invested capital over those years seemed to be highest for the smallest size group, the concerns with an investment of less than \$2 million. This group earned, on the average, 11.6 per cent on invested capital, while the larger groups earned about 9.5 per cent. The same superiority seemed to hold true in specific industries. The smallest steel companies had average earnings of 11.2 per cent, while the giant steel companies, those with \$100 million of invested capital or more, earned only 7.1 per cent. The smallest automobile companies earned 18.5 per cent, while the giants earned 17.9 per cent. In textiles, the smallest companies earned slightly

⁸ R. C. Epstein, Industrial Profits in the United States (New York: National Bureau of Economic Research, 1934).

⁹ H. B. Summers, "A Comparison of the Rates of Earnings of Large-Scale and Small-Scale Industries," Quarterly Journal of Economics, May, 1932, D. 465.

less than the next higher classes, but those with invested capital of less than \$10 million earned about 8 per cent, while the giants earned only 1 per cent. In petroleum, the smallest concerns earned 18.7 per cent, while the largest earned 11.7 per cent on total investment.

So far the evidence is heavily against the presumption that size is profitable—but not all the evidence is in. Most of the foregoing proof is derived from years when the business weather was generally fair. Do the same results hold for the stormy years of depression?

A study made by the Twentieth Century Fund, Inc., 10 contrasts the pattern of profitability in the boom year 1919 with the depression year 1933. The results are striking. In 1919, of all corporations reporting to the Bureau of Internal Revenue for tax purposes, the smallest class, the companies with capital under \$50,000, showed the highest return (27.8 per cent) on stockholders' equity, while the largest size corporations, those with capital over \$50 million, showed the lowest rate of return (9.7 per cent). If we move to the depression year 1933, the pattern for all corporations is sharply reversed. The profits of the smallest corporations are converted into losses of 9.6 per cent on total capitalization, while the largest corporations are the most profitable of any size group, earning 2.5 per cent on total capitalization. This would tend to lead to the conclusion that small concerns are more profitable in prosperity and more unprofitable in depression than large corporations—and that is true if we consider all corporations in each size group, profitable and unprofitable alike. However, if only the profitable corporations are used in a depression year like 1933, the smallest concerns seem again to show their superiority, earning an average rate of return of 7 per cent as against less than 5 per cent for the largest corporations. The reason for the poor showing of small corporations in depression years is that a greater proportion of them are unprofitable.

The greater profitability of small corporations in prosperous years is also found in W. A. Paton's study of 714 identical cor-

¹⁰ How Profitable Is Big Business? (New York: Twentieth Century Fund, Inc., 1937).

porations in different industrial fields for the years 1927-29.¹¹ This study revealed a slight tendency for small corporations, those with assets of under \$200,000, to earn more than the corporations with assets of \$5 million or more. The rates of return on total capital were 9.4 per cent and 8.0 per cent respectively. In manufacturing, the tiny concerns earned 11.3 per cent while the larger ones earned 8.6 per cent, but in trade the tiny ones earned 6.4 per cent as against 7.2 per cent for the larger concerns,—a rather interesting bit of evidence since we ordinarily think of trade as the great bastion of the small proprietor and manufacturing as the field in which bigness is likely to be the most profitable.

But let us return to studies of depression years and follow the evidence a bit further. W. L. Crum 12 made a comprehensive study of earnings of corporations as reported in tax returns for the period 1931-36. On the whole, this was a period of severe business depression, and the expected depression experience was found, namely, that small concerns were less profitable than large, although if only profitable corporations are taken, the smallest companies, those with assets of under \$50,000, in 1936 earned 12.9 per cent on net worth, while medium-sized concerns, those with assets of \$5 to \$10 million, earned an average of 8.4 per cent, and the giants, \$100 million and above, earned only 6.0 per cent. However, more of the smaller corporations were unprofitable so that when all corporations, profitable and unprofitable alike, are considered, the tiny corporations had a deficit of 6.9 per cent on net worth, while the giants earned a profit of 4.6 per cent on net worth, and most of the intermediary group earned profits of from 4 to 6 per cent on net worth. This tendency of small corporations, as a whole, to register smaller earnings than large corporations seemed to be true in 1936 of specific fields of corporate enterprise, such as manufacturing, trade, service, and finance, as well as for corporations as a whole. In many cases, however, the largest were not the most

12 W. L. Crum, Corporate Size and Earning Power (Cambridge: Harvard University Press, 1939).

¹¹ W. A. Paton, Corporate Profits as Shown by Audit Reports (New York: National Bureau of Economic Research, 1935), p. 73.

profitable. Moderate-sized corporations frequently enjoyed the highest rate of return. With the exception of the field of trade, the giants were less profitable than more moderate-sized concerns. The exception in the field of trade again is noteworthy since it is one field in which there is a multiplicity of firms and a demonstrated survival of individual enterprise. The highly profitable record of a few giant chain store and mail-order companies no doubt explains the result.

On the whole, Crum concludes: "I believe my findings clearly show that, on the average, large enterprise—in all or nearly all broad lines of industry, and in different stages of the economic cycle—is more profitable than small enterprise, especially very small enterprise." ¹⁸ This rather sweeping statement is so much at odds with the results of studies for previous, and more prosperous, periods that one wonders if Crum is not too hasty in generalizing about the profitability of size, especially when most of the years were those of depressed economic activity, with not one year of high prosperity among them. (The year 1936 came closest to being one of prosperity.)

Moreover, it is generally recognized that income tax statistics probably understate the true earnings of small corporations, especially when corporate tax rates are high, as they were in the middle 1930's. Most small corporations are owned by a few individuals who draw salaries as managers and employees of their firms. Since salaries and wages are deductible for income tax purposes, the corporation tax on earnings can be avoided by paying what are essentially profits as salaries rather than as dividends. The same persons receive them and the corporate tax is avoided. There is thus a strong tendency for small corporations to pay excessive salaries to their owners—a practice that is, within limits, condoned by the Bureau of Internal Revenue, which requires only that salaries be "reasonable." Officers' compensation is much higher relative to sales and profits in small corporations than in large. Crum found that in the years 1931-36 the corporations with assets of \$50,000 or less paid yearly salaries varying from 23 per cent to 44 per cent

¹⁸ Ibid., p. 7.

of the entire stock equity, while corporations with assets of \$50 million or over paid yearly salaries of less than one-fourth of 1 per cent. Certainly a striking contrast!

The problem is how to correct for this bias. If all officers' salaries are considered profits and added to the profits reported in income tax statistics, the entire earning picture is reversed. Even in a depression period, small corporations earn profits (plus salaries) at a higher rate relative to stock equity than do large corporations. But disregarding salaries in this way is a drastic procedure, since the officers of small corporations are being paid for services other than just being officers. They are not solely "swivel chair" executives. The president of a small retail corporation may be chief clerk, buyer, bookkeeper, delivery boy, and even janitor—jobs for which larger corporations hire separate workers whose pay is part of the regular wage bill, and not officers' compensation. Since no formula exists to correct for excessive salaries in just the proper amounts, conclusions based upon corporate tax returns must be more or less tentative. The way in which that one factor can completely upset statistical evidence can be seen from a few figures taken from the Department of Commerce Report to the T.N.E.C. on the relationship of net earnings (before interest) to total assets of all corporations, before and after correction for officers' salaries, for the years 1934-36:14

Size Class	Net Profit to Total Assets	Net Profit Plus Salaries to Total Assets
Under \$ 50,000	— 3.7%	15.5%
\$ 50,000- 100,000	1.7	11.8
500,000- 1,000,000	5.2	8.2
5,000,000- 10,000,000	6.1	7.0
Over 50,000,000		5.7

The profitability of size seems to depend largely upon how much allowance is made for officers' salaries. Crum found that if only half of the salaries were allowed, his findings of the profitability of size remained unaltered.

¹⁴ T.N.E.C., Monograph No. 15, Financial Characteristics of American Manufacturing Corporations (Washington, 1940).

Size and War Prosperity.—A few bits of evidence permit us to follow our quest for an answer to the riddle of proper corporate size into the period of World War II, and see how the small corporate enterprise fared in the distorted and speeded-up economy of wartime. The shortages of nearly everything and the huge orders for war goods placed mainly with large corporations, which alone could do the job quickly and cheaply—at least as prime contractors—led many to the conclusion that the war would sound the death knell for small business. According to available data no such dire forebodings were justified. Tax returns showed the smaller concerns increasing their net profits (before taxes) in 1942 over both 1939 and 1941 to a much greater extent than did large concerns. A study by J. L. McConnell 15 showed a striking improvement in profitability of all corporations, especially of small corporations. To take a few typical size classifications for all industries except finance:

		A	Adjusted	Net Profits Per Cent of	Before Taxes as
Asset	Class		1939	1941	1942
Under \$	50,000		- 3.4%	14.79	% 19.5%
\$ 500,000-	1,000,000		7.8	20.3	26.0
				20.4	26.3
50,000,000-	100,000,000		6.7	16.7	20.9
				11.4	13.8

Not only is this evidence of profitability of small concerns in the early war period, but it indicates the way in which the prosperity pattern of earnings differs from that of depressions. Profits after taxes would favor the smaller concern even more since our corporate income tax was graduated during this period and each corporation was allowed a flat \$5,000 exemption from the excess profits tax.

The vitality of the small business concerns during the later war years is borne out in other evidence of growth and financial strength. Data based on 2,708 concerns in manufacturing and trade—some incorporated, some not—showed that small and medium-sized manufacturing firms expanded their total assets about 140 per cent and 90 per cent respectively while the large

¹⁵ Survey of Current Business, January, 1946, p. 10.

enterprises, those with assets of \$10 million and over, increased their assets by only 35 per cent between 1940 and 1945. In retail and wholesale trade, the rate of growth was about 50 per cent for all sizes. In addition, small concerns improved their financial position so strikingly that it led the authors of the study, Albert R. Koch and Eleanor J. Stockwell, to remark: "The improvement in financial position during the past five years has been relatively greater in small and medium-size concerns than in large concerns. This is because of the relatively greater increase in sales, profits, and assets (as shown in the chart). At the end of 1945 the small and medium-size concerns were probably in a more liquid position than they had ever been in the history of the country." ¹⁶

The postwar vigor of small business is further evidenced by the increase to record highs in the number of firms in operation, which by 1948 had reached over 3,800,000 in contrast to less than 2,900,000 in 1933 and about the same number in 1943 when war restrictions, the draft, and attractive opportunities in war industries caused many small business firms to suspend operations. There seems to be good reason to expect that the war has not disrupted established patterns of earnings in relation to size.

If additional evidence is needed to show that large concerns are not always the most successful, one might cite the conclusions of the Federal Trade Commission: "In 233 combined tests, large size, whether represented by a corporation, a plant, a group of corporations, or a group of plants, showed the lowest cost or the highest rate of return on invested capital in only 25 tests. In the combined tests, medium size made the best showing in 128 tests and small size in 80 tests." ¹⁷ Here is little support for the notion that advantages are always on the side of size or that economic evolution inevitably will result in increased economic concentration.

There is one more consideration that careful students will

¹⁶ Albert R. Koch and Eleanor J. Stockwell, "The Postwar Financial Position of Business," Federal Reserve Bulletin, December, 1946, p. 1335.

¹⁷ T.N.E.C., Monograph No. 13, Relative Efficiency of Large, Medium-Sized, and Small Business (Washington, 1941), pp. 12 ff.

want to ponder. In all this array of statistics we are prone to attribute causation when all we know is that there is association or correlation. It is an elementary principle that correlation does not indicate causation. Thus even if the statistical series always showed a positive correlation between size and profitability (which they do not) it would be wrong to conclude that the concerns are profitable because they are big. It would be just as sound to say that they are big because they are profitable. Really successful concerns tend to grow, up to a certain point at least. Today's profitable giants may be yesterday's profitable pygmies, even in an industry already dominated by giants. Chrysler Corporation took over the small and unsuccessful Maxwell Company in the early 1920's and grew to greatness, where many others fell by the wayside. It became large because it was successful, not the other way round.

Now the important thing is this. All firms, good, bad, and indifferent, start on a small scale. Small business is a great proving ground. Thousands of new concerns are started every year. Many of them do not live to see their tenth birthday. Many have little chance of success at the outset, but a free enterprise system means that anyone who can get the money can go into any business he wants to. Frequently things do not pan out, not because the business is small, but because it is new, and small business is charged with the loss. One can readily see why it is only in prosperous times when new businesses have a good chance to live for a while that the profit record of small business is so impressive. It may be newness rather than smallness that makes the showing so poor in depression years.

Moreover, not all big concerns stay immune to disease even if they survive infancy and youth. Big concerns sometimes show symptoms of the diseases of age, and many a large corporation has succumbed to hardening of the arteries. That is why mere bigness does not insure success and leading concerns are frequently displaced. Of the 200 largest corporations in 1909, only 83 remained in this class in 1934. The Twentieth Century Fund found that the stocks and bonds of large corporations were frequently poor investments.¹⁸ Few of the 200 largest corpora-

¹⁸ How Profitable Is Big Business? pp. 113-115.

tions in the period 1909-24 were highly profitable. Of 46 large railroads, 12 failed and went into receivership, and only 17 were profitable investments. Of 55 utilities, 12 failed, 6 suffered severe losses in market value, 8 were moderately successful, and only 8 were highly profitable. The industrials did better; out of 99, 7 were dissolved or went into receivership or lost part of their capital; 9 had arrears on preferred dividends, 10 were merged or reorganized without loss; 24 were moderately successful; 74 were successful enough to make their stocks good investments. Of 161 corporations (out of 200) for which data were available, an investment in their stocks would have yielded an average return of less than 6 per cent a year and would have gained only 4.9 per cent in capital value over the entire fifteen-year period. Some were profitable, but others of equal size were very unprofitable.

No one who has considered earnings records carefully will speak lightly of the profitability of size. Variations between industries and corporations are very great, and generalizations hazardous. Certainly there is no demonstrated economic virtue in sheer size.

REFERENCES FOR FURTHER READING

Bonbright, J. C., and Means, G. C. The Holding Company. (New York: McGraw-Hill Book Co., Inc., 1932).

Dewing, A. S. The Financial Policy of Corporations, 4th ed. (New York: The Ronald Press Co., 1941), Book IV, Chs. 1-6.

Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy. 2nd ed. (New York: Prentice-Hall, Inc., 1948), Chs. 23-25.

Haney, L. H. Business Organization and Combination, 3rd ed. (New York: The Macmillan Co., 1934).

Husband, W. H., and Dockeray, J. C. Modern Corporation Finance. Rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Part 4.

Purdy, H. L., Lindahl, M. L., and Carter, W. A. Corporate Concentration and Public Policy. (New York: Prentice-Hall, Inc., 1942).

Ripley, W. Z. Trusts, Pools and Corporations. Rev. ed. (Boston: Ginn & Co., 1916).

Stevens, W. S. Industrial Combinations and Trusts. (New York: The Macmillan Co., 1913).

Temporary National Economic Committee. Monograph No. 13, Relative Efficiency of Large, Medium-Sized, and Small Business. (Washington, 1941).

Chapter 16

CORPORATE CONCENTRATION

One of the terms frequently heard during the past two decades is "corporate concentration." It is supposed to describe a condition that prevails throughout most of our economy. The term is used most often in a derogatory sense by those who favor a certain degree of government intervention or control. Actually it describes a condition in only certain segments of our economy, but it has been a handy tool for those who have used it for critical purposes. It is the old "trust" issue dressed up in new garb, with particular emphasis upon corporate size rather than monopoly through agreement or collusion.

Extent of Concentration.—Studies of corporate size were numerous in the early 1930's, as though the ideas associated with the phenonemon of size were nurtured by the Great Depression and the search for its causes. The first study, of the 200 largest corporations, by Gardiner C. Means, published in 1931, became a much-quoted basic reference.1 It was followed in 1933 by the book The Modern Corporation and Private Property by Berle and Means, which sought to explore the social and legal implications of corporate concentration and diffused stock ownership. Its essential thesis is that there is an increasing tendency for our productive resources to come under the domination of a few giant corporations, which in turn are controlled by managements who are not accountable to anyone, since scattered stock ownership makes the stockholder a pawn rather than one who controls management and makes final decisions. At present we shall look only at the factual evidence of increasing size and its implications.

¹ Gardiner C. Means, "The Large Corporation in American Economic Life," American Economic Review, March, 1931, p. 10.

The study by Berle and Means revealed that the 200 largest nonbanking corporations had aggregate assets of \$81 billion on January 1, 1930. This was nearly one-half of all nonbanking corporate assets (\$165 billion) owned by over 300,000 smaller corporations, nearly two-fifths of all business wealth, and over one-fifth of the entire estimated national wealth in 1929 (\$367) billion). Moreover, they found that in 1929 the 200 largest nonbanking corporations, each with an income of over \$5 million, received about 43 per cent of all nonbanking corporate income reported for income tax purposes. The smallest of these giants had assets of \$94 million and the largest (American Telephone and Telegraph) had \$4,228 million. Fifteen corporations had assets of over \$1 billion. Even more impressive, perhaps, was the estimate by Berle and Means that the giants were growing at a more rapid rate than national wealth and two or three times as fast as all other nonfinancial corporations, and that the rate of increase was accelerated in the period 1924-29. If the 1924-29 rates of growth were to continue, they predicted that by 1950 four-fifths of all corporate wealth would be held by the 200 giants; or if the more moderate differential rate of growth for the years 1909-29 were maintained, the giants would hold 70 per cent of all corporate wealth.2

The conclusions drawn by Berle and Means from their statistical evidence were criticized severely. Perhaps the most important defect was the inclusion of industries such as public utilities and railroads in which combination or monopoly had long been sanctioned or encouraged as desirable from the social point of view. If the purpose was to show increasing concentration in competitive industries, the basic data were, of course, defective. Of the 200 largest corporations in 1930, 42 were railroads, 52 were public utilities; only 106 came in the industrial or "competitive" category. Only 3 of the 15 companies with assets of over \$1 billion were industrials (United States Steel, Standard Oil of New Jersey, and General Motors). Furthermore, the phenomenal development of public utility holding companies during the 1920's probably influenced the entire study,

² A. A. Berle, Jr., and G. C. Means, *The Modern Corporation and Private Property* (New York: The Macmillan Co., 1933), pp. 18-46.

although it was also a period marked by the expansion and combination of industrial corporations. For the period 1919-28, 35 public utility corporations increased in assets by 194 per cent, while 71 industrials grew 58 per cent and 44 railroads grew 24 per cent. Thus the former exerted a strong influence upon the combined rate of growth. It might be noted here that utilities obtain their monopoly positions through government-granted franchises. Regulation rather than competition protects the public. Moreover, the holding company systems in the electric and gas industries are being broken up under the Public Utility Act of 1935.

Although this is not the place for an extended discussion of the methods used in this study, one or two observations by Rufus S. Tucker 8 are to the point. He criticized Berle and Means for excluding some asset items, such as stocks and bonds held in other corporations, from the wealth of all corporations, but including them in the 200 largest. Perhaps this did not greatly distort the general findings. More important is the necessity to keep in mind precisely what companies made up the 200 largest corporations in the years used for comparison. Berle and Means did not use the same corporations throughout the study. The 200 largest corporations in 1924 were not the 200 largest in 1909; in fact, about two-fifths of these giants in 1909 were no longer among the 200 largest in 1924, and only 83 of them remained in this top group in 1934. Thus there is a constant turnover in this group. What Berle and Means actually measured was the growth of assets owned by the 200 corporations that happened to be largest in one year as compared with the assets owned by those that happened to be largest in another year. Naturally some were identical but others were not. Furthermore, in showing that the 200 largest corporations received 43 per cent of all corporate incomes in 1929, Berle and Means were referring to the 200 largest corporate incomes reported for that year—a very different thing. Tucker contended that if comparisons had been made on the basis of the returns actually made by the largest corporations (some of which made

⁸ Rufus S. Tucker, "Increasing Concentration of Business Not Supported by Evidence," Annalist, July 31, 1936.

only small incomes or suffered losses), the giants were not getting an increased share of total income, up to 1927, at least. These shifts in the identity of corporations examined make the conclusions much less valid than they seem at first sight.

Concentration in Various Industries.—There can be no doubt that some corporations have achieved a size that makes them larger than thousands of small ones rolled together, and that this size brings with it problems of broad public policy as well as a challenge to explore the extent to which managements are accountable to those who put up the capital and take the risks of the enterprise.

First, it must be clear that giantism is not characteristic of all fields of economic activity. Fields like agriculture, service, and construction are characteristically those of small-scale enterprise, as are large segments of retail and wholesale trade. It is in manufacturing, along with railroads and public utilities, that we find certain industries dominated by a few large firms. The studies of the Twentieth Century Fund, W. L. Crum, and the National Resources Committee all bear this out.4 The Twentieth Century Fund found that of 388,564 corporations reporting balance sheets for income tax purposes in 1933, 594 (or .15 per cent) held 53 per cent of the total assets reported by all. At the other end of the scale, 211,586 corporations with assets of less than \$50,000 (or 54 per cent in number) held only 1.4 per cent of the total assets. It was estimated that the 594 giants accounted for 18 per cent of all economic activity in 1933, but they were of no importance in agriculture, mining and quarrying, or construction. On the other hand, they accounted for 66 per cent of transportation and public utility industries, 33 per cent of manufacturing, 17 per cent of finance, and 7 per cent of trade.

The field of greatest concentration, railroads and public utilities, is recognized as monopolistic and is regulated by government. The field of manufacturing is presumably competitive

⁴Twentieth Century Fund, Inc., Big Business, Its Growth and Its Place, 1937, and How Profitable Is Big Business? 1937; W. L. Crum, "Concentration of Corporate Control," Journal of Business of the University of Chicago, July, 1935, p. 269; National Resources Committee, The Structure of the American Economy, 1939, pp. 290-291.

and here the high degree of concentration in some industries is of greater significance. But generalization is hazardous. Manufacturing industries showing greatest concentration, as measured by the percentage of all workers employed by the six largest concerns, are, in order, cigarettes, typewriters, linoleum, copper refining, corn syrup, sewing machines, photographic apparatus, explosives, matches, firearms, watch cases, cash registers, rayon, motorcycles, and beet sugar; in each of these fields the six largest concerns employed over 80 per cent of the workers in the industry. At the other extreme are women's clothing, cotton goods, silk and rayon goods, stamped ware, paper, confectionery, food canning, and textile finishing; in each of these the six largest concerns employed less than 20 per cent of all workers in the industry. Between the extremes fall the rest of the 84 industrial groups, with such important industries as automobiles, motion pictures, tin cans, aluminum products, agricultural implements, and steel above the average in the degree of concentration, and industries like woolen goods, boots and shoes, machine tools, cigars, hardware, cement, and chemicals below the average.5

Even in the field of retail trade, where concentration is not great, there is great variation. In 1933, chain stores, which tend to be fairly large, accounted for 91 per cent of the total sales of variety stores, 46 per cent of the sales of shoe stores, 45 per cent of grocery stores, but only 6 per cent of jewelry stores, 14 per cent of furniture stores, 15 per cent of restaurants, and 25 per cent of the sales by all retail stores. Why should there be such differing degrees of concentration in different fields is a complex problem of the economics of size. Apparently, large concerns, as we have seen, are successful in some fields and unsuccessful in others.

Before leaving the problem of corporate concentration we might enlarge our perspective by asking three questions: (1) Is concentration a new or recent development? (2) Is it growing? (3) What are some of its economic implications?

⁸ Big Business, Its Growth and Its Place, pp. 41-47. ⁹ Ibid., p. 49.

Is Concentration Recent?—With the appearance of Means' first study, there were those who believed that it would revolutionize our thinking about the free enterprise system. Henceforth we were to think in terms of oligopoly or monopoly rather than competition, and the question arose: Could an economic system predicated upon the benevolent working of free enterprise, guided and balanced by competitively determined prices, operate under these "new" conditions? Even the concept of property had to be changed, for the "atom" of ownership had, through the corporation, been split into two independent segments—ownership and management. The whole matter was summed up by the frequently quoted statement that "a fraction of 1 per cent of the corporations control over 50 per cent of all corporate wealth," usually with the correlative thought that anything done by government in light of this discovery is desirable.

Why anyone should assume that all corporations should be the same size is a mystery. Probably few would go as far as that. It needs little reflection to see that we would be poorer rather than richer if no corporation could grow larger than the \$50,000 concern that makes up the majority of our corporations. In fact, these tiny concerns would not be corporations at all were it not for our generous corporation acts which permit what are in essence individual proprietorships or partnerships to achieve limited liability and perpetual life by incorporating. They are not in need of the one thing that only the corporation can provide, namely, a method of gathering small amounts of society's capital from a thousand small sources to make a large fund with which to carry on industry and trade efficiently, and on a scale beyond the means of a few persons. If the corporate form were to be confined to relatively large enterprises, as advocated by Adam Smith, these startling percentage comparisons would become much less spectacular. In any case, percentage comparisons can be misleading.

Furthermore we seldom think of other phases of society in which similar degrees of concentration exist, if we wish to highlight them. For example, our federal government is only one out of 155,000 separate governmental units in this country. Yet this .00006 per cent of our governments spends 80 per cent of our

public money and owes over 90 per cent of all public debt. Similarly there are over 250 religious denominations and sects, yet the largest 2 per cent have over 75 per cent of the membership. Probably similar degrees of concentration would be found in labor unions, social organizations, population distributions, land areas, and other magnitudes. Of course we do not hear of concentration in these areas because there is no logical reason why all political, religious, labor, fraternal, or social groups should be of uniform size. Neither does there seem to be a logical reason why economic units should be reduced to a common denominator. There are economic problems of size but they are not intelligently stated, much less answered, by the usual percentage comparisons.

But is "concentration" something that has recently come upon the scene? The answer would seem to depend upon what is meant by "recent." We have seen that aggregations of property have been brought together under common direction since antiquity. No doubt concentration in government and religion was greater than in economic life, but sizable business units have probably existed for a long time. The coming of the machine age with capital-using developments in manufacturing and transportation ushered in an era where larger and larger business units, organized under the corporate form, became characteristic of certain industries. Spurred on by technical developments, the expansion of markets, and the desire to gain the advantages of large-scale production and distribution or to eliminate competition, business concerns increased in size by internal growth, by merger, or by acquisition of control. Since the Civil War this tendency has given rise to the perennial "trust problem."

By 1930, many were heard to voice the opinion that competition was dying, if not dead, and repeated the figures on concentration and prospects of still further concentration with a finality that left room for little more than a decent burial of the competitive system. Paradoxically, one of the first things that was done in our version of the new economic policy was to restrict competition between businessmen still further by forcing them to abide by the "codes of fair competition" of the N.R.A. Farmers were paid to cut down production and raise prices—all in the

name of "balanced abundance"—to give them all the benefits presumably enjoyed only by those in concentrated industries who "administered" their prices rather than produced unlimited quantities and threw them on the market for what they would bring. The encouragement of labor unions is another evidence of the impetus given to the concentration of economic power by government policies in the 1930's.

Whether our system was more concentrated in 1930 than at the turn of the century cannot be stated conclusively, since the data are inadequate. It is enough to know that the condition was neither new nor unique. Some would contend that the trust movement in the late 1890's brought about as great a concentration as existed three decades later. In some lines that is undoubtedly true. The giant United States Steel Corporation, for example, controlled about two-thirds of the steel industry when it was organized in 1901. By 1930 its competitors had grown more rapidly and left it with only one-third of the nation's steel capacity. It is hard for us to realize the extent of concentration fifty years ago. John Moody informs us that 440 of the largest trusts had total assets of over \$20 billion in 1904.7 Many of them, by sheer size or through patents, controlled a large portion of their industries. Space prevents an enumeration of the single corporations that controlled over half of the total output of their fields. In 1904 there were dominating corporations in the following industries: lead, linseed oil, sugar, tobacco, petroleum, steel, machinery, brake shoes, tin cans, chewing gum, freight car building, cotton oil, glue, garden implements, phonographs, leather, locomotives, radiators, school furniture, shipbuilding, thread, type, woolen goods, dress patterns, pipe, scales, matches, whiskey, electrical equipment, refractory brick, farm machinery, paper, biscuits, carbide, glass, toys, elevators, baking powder, railway springs, plumbing ware, paper bags, typewriters, bananas, cast-iron pipe, rubber goods, and fertilizers. Thus it would appear that our economic system had been pretty thoroughly inoculated with the virus of concentration some time ago.

⁷ John Moody, The Truth About Trusts (New York: Moody Publishing Co., 1904).

Is Concentration Growing?—Although Berle and Means were positive that we would see a high degree of concentration by 1950, if trends before 1929 continued, Crum held that it was impossible to tell whether the trend toward concentration was growing. The Twentieth Century Fund made no prediction, but it found that the nominal capitalization of 200 giant corporations grew at the rate of only 3.5 per cent a year between 1909 and 1924, while national wealth rose at the rate of 5.1 per cent, national income at the rate of 6.6 per cent, and the cost of living at the rate of 4.3 per cent.⁸ Such rate comparisons do not indicate that the 200 largest corporations grow faster than the economy as a whole.

Although it still is common to hear the phrase "growing concentration of economic power," the evidence does not seem to indicate that the trend has continued to the present time. Nevertheless, the trend did not cease completely after 1929. The National Resources Committee found that the 200 largest nonfinancial corporations, plus over 250 nonconsolidated subsidiaries, had by 1933 increased their proportion of total assets to 57 per cent from 49 per cent in 1929, and 75 manufacturing companies had increased their percentage of total assets from 39 per cent in 1929 to 45 per cent in 1933.9

Although the Temporary National Economic Committee made a comprehensive investigation of concentration, particularly as it related to monopoly, it did not settle the question of the trend toward further concentration. This committee was set up by Congress in 1938 at the request of President Roosevelt, and consisted of twelve members, six appointed by the President from his executive departments, three by the House of Representatives, and three by the Senate. Under the chairmanship of Senator O'Mahoney it sponsored and organized research studies covering many phases of American economic life, particularly corporate practices, and published forty-three monographs of varying quality and objectivity.

The resulting light that was shed upon the problem of con-

⁸ How Profitable Is Big Business? p. 115. ⁹ National Resources Committee, The Structure of the American Economy (Washington, 1939), pp. 290-291.

centration is meager. Although this problem was the primary motivating force in the investigation, there was strangely little added to our knowledge of it. As David Lynch in his appraisal of T.N.E.C. put it:

It is remarkable that in a study as extensive as was that undertaken by the T.N.E.C. into the "concentration of economic power" that so few of the important questions relating to concentration were analytically or systematically explored. The hearings began and ended with the assumption that concentration is becoming increasingly characteristic of the economy, and it was continually implied that the trend is undesirable. Yet nowhere was the matter the subject of careful scrutiny. Just what concentration is or how it is measured was left unanswered. The extent to which concentration is characteristic of the economy was left to conjecture. Quantitative measures of the trend, decade by decade during the last half century, were lacking. Broad generalizations and inferences were compounded without factual foundation.¹⁰

The coming of World War II brought with it profound changes in our industrial life, among them tendencies which seemed to give advantages to large corporations and so again raise the problem of increased economic concentration. Government war orders for airplanes, tanks, explosives, ships, and other goods were naturally channeled to the corporations which had the plants, labor supply, and know-how to do the job-and in a hurry. Although constant congressional pressure was brought to bear to award more contracts to small business, about two-thirds of the prime contracts went to the 100 corporations holding the largest war contracts. Five firms (General Motors, Curtiss-Wright, Ford Motors, Consolidated Vultee Aircraft, and Douglas Aircraft) received about one-fifth of all prime contracts, and the top twelve corporations received one-third of the total. Of course, dealing with a few concerns rather than many greatly simplified and expedited arms procurement. Moreover, the prime contractors were in the best position to seek out subcontractors, who, by the thousands, participated in the business of supplying the flood of arms that utilized every

¹⁰ David Lynch, The Conventration of Economic Power (New York: Columbia University Press, 1946), pp. 360-361.

productive facility from the River Rouge plant of the Ford Motor Company to the basement workshop of the amateur machinist. This widespread scattering of orders through subcontracting, and the temporary nature of much war work, such as aircraft manufacture and shipbuilding, did much less to promote concentration than is commonly supposed. Probably over half of the 100 corporations receiving the largest war contracts did not appear in a prewar list of the 200 largest corporations, and most of them have shrunk drastically since V-I day. Many of them were unable to operate profitably during the postwar shrinking process, for example, aircraft manufacturing and shipbuilding. Moreover, the closing of many small business enterprises during the war, as their owners were drawn into the armed services, or sought war jobs, or were deprived of materials by war shortages, gave way to the opening of new small businesses in unprecedented numbers in the postwar period.

Estimates have been made of the effects of World War II on economic concentration, but the results are debatable. Merely citing the percentage of war contracts held by the 100 largest war contractors tells us little more than that some large corporations and some small corporations played a large role in the war effort; such data throw no light on the trend toward concentration, except perhaps to indicate that some prewar pygmies reached the top class because of war orders.

Nor is an increasing trend toward concentration shown by the fact that firms employing less than 500 workers accounted for only 38 per cent of the total manufacture in 1944 against 52 per cent in 1939. Many firms employed more workers during the peak of the war effort and many moved from below to above the 500 class. Such data are not reliable evidence of a trend toward greater concentration. Nor can the number of corporations which have sales, profits, or assets beyond a certain figure be taken as a measure of concentration. War and the accompanying increases in prices and volume of production and trade have increased these figures all along the line. If we had a period of hyperinflation, many business concerns might have a dollar volume of sales, assets, and profits at the billion-dollar.

level, but that would obviously tell us nothing about the degree of concentration.11

In a study made in 1945, K. C. Stokes 12 found no tendency toward increasing concentration in manufacturing after 1929. While the 200 largest manufacturing concerns grew during that time, their rate of growth in assets was less than that of 800 other manufacturing corporations with assets of \$1 million to \$27 million. Moreover, the smaller concerns experienced a greater growth in sales volume, profits, and working capital during the years 1939-43 than did the giants. The 200 largest represented about 49 per cent of all manufacturing in 1936 and 50 per cent in the next three years, but dropped to 44 per cent in 1942. A subsequent study by the same author revealed that the superiority of the small and medium concerns carried over through 1946. These conclusions are in line with the war experience of smaller concerns that we have previously discussed, and are additional evidence of the superior relative performance of small corporations in periods of prosperity.

What will happen if we experience a severe depression is, of course, a real question, but for the present there seems to be little conclusive evidence that war or immediate postwar conditions have been marked by an increasing trend toward concentration. What the future will hold (the curve of corporate mergers again is rising) we cannot foretell, but of one thing we can be sure: events since 1929 have shown that there is nothing inherently inevitable about the upward trend in concentration. If such a trend existed before 1929 it has now flattened out in the industrial field and among railroads. In public utilities the trend is sharply downward as holding companies are broken up and simplified under Section 11 of the Public Utility Act of 1935.

Economics of Concentration.—The full implications of the development of the giant corporation upon the economic welfare of the people as a whole have never been accurately assessed

¹¹ For questionable evidence that increased concentration has resulted from World War II, see Report of the Smaller War Plants Corporation to the Special Senate Committee, *Economic Concentration and World War II*, Senate Doc. No. 206, 79th Cong., 2nd Sess. (1946).

12 K. C. Stokes, "Financial Performance of Large Corporations," *Survey of Current Business*, August, 1945, p. 4.

and probably can never be determined with precision. On the one hand, efficiency is undoubtedly promoted in some industries by large-scale production and distribution, which call for aggregations of capital far beyond the capacity of the small individually owned firm. The steady march toward greater mechanization has undoubtedly increased the total output and raised the standard of living of our society. Each worker's productivity has multiplied, not by a change in his own strength or ability. but because he has the help of mechanical power, productive techniques, and management arrangements that are possible in large business units. But that does not necessarily mean giant units. The fact is that we know very little about the most efficient size of an enterprise. It may be relatively small for such purposes as the most efficient arrangements of physical productive processes. It may be larger for other purposes, such as purchasing, advertising, and selling. It may be larger still to achieve the over-all economies that come from centralized determination of general business policies, including financing and labor policies. A giant concern like General Motors Corporation has succeeded pretty well in finding the proper blend of local autonomy and centralization. Its divisions and subsidiaries make many decisions on their own initiative. It is said that they are not even required to buy their materials from other subsidiaries if they can get them better or cheaper elsewhere. This independence of action keeps local managements on their toes and aggressive. On the other hand, there is little question that the facilities afforded by the parent company have been of great help to the divisions, perhaps even saving them from failure on occasion.

The ability of the large corporation to survive in a competitive field is at least prima facie evidence that not all giants become inefficient. The real question for society as a whole seems to be whether all of us—consumers, workers, capital suppliers—are better off if goods are produced under conditions that may involve one or more giant corporations in an industry than if some maximum size limit were imposed by law. There is, of course, a third alternative, and that is to permit the giant corporation but regulate it as we do our railroads and public utilities. It

is somewhat anomalous that the New Deal, which made so much capital out of "concentration of economic control," did little or nothing to reduce the size of corporate giants, except in public utilities, although it pointed the finger at concentration whenever it pushed through its reform measures in any field. This should be evidence that even the critics of corporate size are not prepared to take the consequences of industrial "atomization," however much they may use it as a reason for extending government's control over business.

When we come face to face with the facts, we find it difficult to decide whether we would be better off if there were no General Motors, Ford, or Chrysler corporations, no General Electric or Westinghouse, no United States Steel or Bethlehem, no Great Atlantic and Pacific Tea, no Sears, Roebuck or Montgomery Ward, no J. C. Penney, no Woolworth or Kresge, no Eastman Kodak or Loew's, no Armour or Swift, no National Dairy or Borden, no Singer Manufacturing Company, no International Harvester Company—but instead hundreds of small concerns in their places. To decide in any one of these cases would be a tremendous problem. Perhaps all we can say is that where the policies of the firm have resulted in better products at lower prices, better wages and working conditions, and better returns to invested capital than would otherwise have been the case, bigness has been the handmaiden of economic progress. Where, however, it has resulted in inferior products at excessive prices. low wages, poor working conditions, and losses and waste of capital, it has been detrimental. The latter type of concern would tend to fall out if competition in the industry were at all virile, for the history of inefficient combinations has been a record of failure. Of course fitness to survive is not always tested fairly in the competitive market place. Monopoly may insulate the concern against this social test. If that is so, a firm may be a financial success and at least a partial failure from the social point of view. By having a selling monopoly it may charge more than competitive prices; by having a buying monopoly (monopsony) it may pay less than competitive prices for labor and materials and so succeed. But that is a result of monopoly,

not of size. The two must be kept distinct; they are frequently confused, either inadvertently or deliberately.

The confusion results partly from the recent tendency of economists to distinguish between "pure" or "perfect" competition on the one hand and "imperfect" or "monopolistic" competition on the other. The former refers to a market situation in which there is an unlimited number of sellers of a completely standardized good, where no seller is important enough to influence supply or price. Each takes the market price for granted and in the light of this situation, decides to sell, or not to sell. Except for this decision, there is no price policy. A wheat or cotton farmer taking his crop to market is an example of this purely competitive market.

An element of monopoly enters whenever these conditions are violated. If, for example, a farmer sets up a roadside stand and sells sweet corn and tomatoes, he puts a price on them; that is, he has a price policy, and no matter how many other farmers down the road do the same thing, they are not purely competitive, but are engaged in "monopolistic competition." Each is likely to try to increase his sales by convincing the buyers of the superiority of his products as well as by his price policy. A moment's reflection will reveal that what the economist calls monopolistic or imperfect competition is exactly the same as the popular concept of competition. Retailers, wholesalers, farmers, workers, small business, big business, or any other groups who have something to sell will usually put a price on their product. Yet that does not give the seller monopoly power, except in a very restricted and academic sense. It seems to put a strain on ordinary usage to say that because such sellers have a price policy they are in a position to "administer" prices. As long as the customer has the alternative of buying the same product (or nearly the same product) from someone else who is acting independently and who is striving to increase his income by selling a greater volume, some of the essential requirements of competition as an economic force are met. This competitive striving to advance one's self by selling more goods through better quality, lower price, or more efficient methods was the essential foundation upon which Adam Smith and the classical economists built their

logical defense of the free enterprise system. They believed that the "unseen hand" would guide individual selfishness in the paths of social benefit.

Concentration, Economic Power, and Public Welfare.—As we move from "monopolistic competition" to a situation where there are only a few sellers (oligopoly) or two sellers (duopoly) of similar products, and to the extreme of pure monopoly, where there is only one seller and no feasible substitute for the product, we begin to run into a market situation in which human selfishness may work social ill rather than benefit. These monopolistic situations may result from a high degree of concentration, or they may come about by the collusion of a number of individual firms. Our attention for the moment will be directed to the problem of concentration as it affects the operation of our economic system. Only a few of the facets can be explored here.

· In the first place, the giant firm means that the well-being of thousands of workers, thousands of stockholders, and millions of customers depends upon the decisions of one management instead of many managements. For example, a 1948 compilation 18 showed that the 100 largest manufacturing corporations had total assets amounting to \$26 billion at depreciated cost (or \$43 billion at present replacement cost); this represented an investment of \$6,500 (or \$10,750 at replacement cost) for each of the 4,000,000 workers employed. These 100 corporations were owned by 5,000,000 stockholders (including duplications). In such concerns hundreds of persons participate in formulating decisions, but only the officers and directors have the initial authority. Policies must be made to conform with forces beyond the control of even the largest firm: the ability and willingness of customers to buy, the willingness of hundreds of firms to supply needed raw materials and supplies, and the willingness of thousands of laborers to work for the company. Moreover, the firm must be careful to observe a multitude of laws, to submit to government regulations, to pay taxes, to obtain capital, to hire

¹⁸ National City Bank, Monthly Letter of Economic Conditions, Government Finance, June, 1948, p. 69.

management, etc. Even the largest firm cannot have its own way in most of these matters.

In the second place, large size as such does not mean higher prices to consumers or lower prices to those furnishing labor, raw materials, or other resources to the firm or the industry. It is true that as a firm grows in size it is likely to become more conscious of the effects of its production and price policies in both selling and buying. But that may mean more severe rather than less competition. The advent of the large chain stores in the retailing of groceries, meats, clothing, and shoes probably resulted in a policy of lower prices and higher volume for both them and their competitors. Certainly it would be rash to say that prices have been raised because of the chain store. Whatever one may think of that development on other grounds, credit for lower prices and better merchandising methods can hardly be denied them.

Moreover, efficiency of production may result from the existence of the domination of an industry by a few large concerns. If we had the "unlimited number" of producers of automobiles that "perfect" competition requires we would probably have fewer and more costly automobiles than we have today. The price of "perfect" competition here is too high to pay. As long as the three giants (General Motors, Ford, and Chrysler), which account for over 80 per cent of all car production, strive to increase their profits by producing better cars and selling more of them, as long as we have vigorous independents, like Studebaker, Packard, Hudson, and Nash, as long as firms with new ideas and experienced management, like Kaiser-Frazer, can take up the production of new cars on short notice, and as long as a new and unheard of car of radical design called the Tucker can be used as the basis of the sale of new stock netting the company \$15 million and the sale of dealerships netting another \$7 million, it seems that, even in a highly concentrated industry, competition and potential competition are very much alive. It is quite likely, therefore, that the gains from large-scale operations are shared by the users of cars. The fact that, in general, the largest concerns tend to take the lead in paying the highest wages (because of labor-union pressure or otherwise) is evidence of labor's

participation in the gain; and those who put their capital into these companies have had liberal returns in dividends and capital appreciation.

It is hard to see who has been injured by this development unless it was the more than a hundred makers of cars that lost out in the competitive race—a necessary result of the striving between the efficient and the inefficient. Possibly other concentrated industries have not served society as well, but the important point is that a concentrated industry may be of public advantage because "perfect" competition requires a large number of firms that may be economically inefficient.

One rather striking result of concentration is what might be called "socially conscious pricing." This was clearly evident in the period of scarcity following World War II. While farmers and others selling in more competitive markets took the full market price that equated demand with supply, the concentrated industries—particularly automobiles and steel—set prices well below those that would have "cleared the market." The result was a gray market in steel and cars. Many new middlemen arose to take advantage of the fact that the manufacturers were not charging prices as high as were warranted by the swollen demand. They reaped large gains by buying at the list prices and reselling at equilibrium (gray market) prices. Of course this practice was not necessarily condoned by the manufacturer who would probably have preferred to get the customer's good will by selling him the product at list prices. Why didn't the makers charge full market prices? Probably because of their fear of public opinion and possible restoration of government price controls, and because of the danger to their reputations and long-term markets and the fear that their competitors would not go along, or that such pricing would add to the inflationary spiral and hasten the "bust" that was supposed to be the inevitable result of the "boom." Small manufacturers were freer to take advantage of such market situations. A trade paper reported that a small pig-iron producer in Texas decided that he might just as well get the full market price for his product (\$70-\$90 a ton) as to sell it at the list price of \$42. He openly advertised pig iron for sale at the higher price and apparently had many satisfied customers. One can imagine the outcry if the big steel companies had acted in this manner.

Finally, a word should be said about corporate concentration and economic instability. In the recession of 1938, President Roosevelt asked Congress to make an investigation of industrial concentration because industries with "managed" prices, like cement and steel, suffered large declines in production and employment, while competitive industries with "flexible" prices maintained their level of operations much better. As we have seen, Congress complied by establishing the T.N.E.C. Earlier, in 1935, Gardiner C. Means, then a government economic adviser, had published a monograph, Industrial Prices and Their Relative Inflexibility, in which he sought by the use of data on production and prices to prove that economic concentration led to price inflexibility which in turn led to falling production, while the absence of concentration led to flexible prices, and a continued high level of production in depression. For example, farm prices fell drastically from 1929 to 1932, but production was maintained. On the other hand, the prices of farm machinery fell only slightly, but production was sharply curtailed. An extensive literature has been built up around the subject of price flexibility, but the answers are not conclusive. At any rate, the theses that price inflexibility is due to corporate concentration and that price inflexibility is something new to our economy have been rather well refuted, on grounds both of theory and of fact.

In the first place, it is hard to see how a rational businessman, under either competition or monopoly, would hesitate to reduce prices if by doing so he would keep up his volume of sales, increase his profits, or cut his losses. Even monopoly prices are therefore not necessarily inflexible prices, given rational behavior.

In the second place, if prices in depression did not fall because marginal costs were rigid, they were in keeping with competitive pricing. Here the vast difference between agriculture and manufacturing is patent. A farmer kept on producing because his cost structure gave him no alternative. Most farm costs are

"overhead" or "fixed" costs; they do not vary with output. They consist mainly of the cost of maintaining his labor supply (his family), interest, taxes, depreciation on buildings and machinery, and subsistence feed for livestock. These costs go on whether or not production takes place in any month or year. In times of low prices and depression most of his machinery. buildings, and livestock cannot be sold at more than give-away prices: there are few, if any, prospects of alternative employment for himself or his family. He might just as well raise all the crops he can to help meet the costs he must meet anyway. And so in effect his marginal costs, in terms of alternative uses of his owned resources, may still be below the prices he receives. Moreover, farming is traditionally a gamble on the weather, and under the most favorable conditions he might do quite well even with low prices. Economic calculation on the farm is not likely to be exact.

On the other hand, the production of farm machinery may involve a marginal cost that has declined little, if at all, in a time of depression. Labor costs show little downward flexibility; raw materials may not fall much in price. If the intensity of demand is not high enough so that a high marginal cost can be covered, the manufacturer can reduce his loss by cutting production, laying off labor, and buying few raw materials. In short, a larger part of his cost is variable, and this he can avoid by cutting output. This is not a result of concentration, but of a different cost structure.

Moreover, manufacturers of durable goods face another problem: the almost complete collapse of demand for their products in hard times. It is said that only one new steam locomotive was ordered in the year 1932. At what price would our railroads, with unused equipment rusting on sidetracks, have bought new locomotives in that year? Or, for that matter, how many farmers would have bought new machinery—even if the price had been cut in half—when most of them were trying desperately to pay for what they already had? This great cycle-sensitivity of demand is due to causes other than rigid prices. The consumption of nondurable manufactures with inelastic demands,

like cigarettes, matches, chewing gum, and electricity, remained high despite "inflexible prices."

Later statistical studies of the relationship between concentration and production changes have revealed that Means' findings are of dubious validity. His sample applies to only 37 industries, and the statistical relationship of concentration to price change is poor. W. L. Thorpe and W. F. Crowder, working with Census of Manufactures figures, studied price and production data for 407 individual commodities. They found no perceptible relationship between concentration and price-production behavior, although they found some tendency for commodities that dropped least in price to decline most in production.¹⁴ Jules Backman found little relationship between price changes and the quantity of output for 264 individual commodities from 1929 to 1933.15 E. M. Doblin reached similar conclusions.16 Alfred C. Neal made one of the most comprehensive studies of the problem and found that in 68 industries with national markets there was no significant relationship between concentration and change in production between 1929 and 1931, and that differential price behavior could be better explained by the nature of costs than by concentration.17

What is more, differing degrees of price flexibility in different industries have been characteristic of our economy for decades. Only those unfamiliar with history or unconcerned about accuracy could have contended that this was one of the really new things about the Great Depression of the 1930's. R. S. Tucker went back as far as 1837 and found that commodities differed greatly in their price sensitivity to depression.¹⁸ E. S. Mason found no tendency toward increasing inflexibility of prices from

 ¹⁴ W. L. Thorpe and W. F. Crowder, "Concentration and Product Characteristics as Factors in Price-Quantity Behavior," American Economics Review, Papers and Proceedings, Vol. 30, 1941.
 16 Jules Backman, "Price Flexibility and Changes in Production," The Conference Board Bulletin, February 20, 1939.
 19 E. M. Doblin, "Some Aspects of Price Flexibility," Review of Economic Statistics, Vol. 22, 1940.
 17 Alfred C. Neal, Industrial Concentration and Price Inflexibility (Washington: American Council on Public Affairs 1942)

ington: American Council on Public Affairs, 1942).

18 R. S. Tucker, "The Essential Historical Facts about 'Sensitive' and 'Administered' Prices," Annalist, February 4, 1938, pp. 195-196.

1890 to 1936.19 Some economists go so far as to state that the failure of some prices to fall in times of depression is one of the props to recovery rather than a cause of depression, but that matter lies outside the limits of this study.

REFERENCES FOR FURTHER READING

- Berle, A. A., Jr., and Means, G. C. The Modern Corporation and Private Property. (New York: The Macmillan Co., 1933), Ch. 3. Guthmann, H. G., and Dougall, H. E. Corporate Financial Policy, 2nd ed.
- (New York: Prentice-Hall, Inc., 1948), Ch. 23.
- Husband, W. H., and Dockeray, J. C. Modern Corporation Finance, rev. ed. (Chicago: Richard D. Irwin, Inc., 1948), Ch. 36.
- Neal, A. C. Industrial Concentration and Price Inflexibility. (Washington: American Council on Public Affairs, 1942).
- Pegrum, D. F. The Regulation of Industry. (Chicago: Richard D. Irwin, Inc., 1949), Ch. 5.
- Purdy, H. L., Lindahl, M. L., and Carter, W. A. Corporate Concentration and Public Policy. (New York: Prentice-Hall, Inc., 1942), Chs. 1-6.

¹⁹ E. S. Mason, "Price Inflexibility," Review of Economic Statistics, Vol. 20, 1938, p. 53.

Chapter 17

THE TRUST PROBLEM

One of the most persistent problems of public policy in the United States has been the trust problem. The discouragement or prosecution of monopolies, or "trusts" as they have been popularly known, is the one consistent economic policy that has been followed since 1890, with some general aberrations, such as the N.R.A. episode from 1933-35, and with varying degrees of vigor. The Sherman Act, outlawing monopolies and restraints of trade, was passed with only one dissenting vote in 1890, and has in the course of time been strengthened by amendments. There are few persons today who would have the temerity to suggest its repeal, for it is something more than a law prohibiting certain practices and prescribing penalties; it is the symbol of an economic philosophy that is perhaps singularly American, although shared by other nations in some degree. That philosophy holds that the greatest economic good can be accomplished by maximizing individual freedom, just as the greatest happiness can come to men by freeing them from political restraints. That Adam Smith's Wealth of Nations should have been published in the same year that the Declaration of Independence was signed is no mere coincidence. Laissez faire in economics and politics went hand in hand. They were joint roots of the tree of nineteenth-century liberalism.

Theory of Free Enterprise.—The proponents of economic liberalism went beyond the mere assertion that it was good for individuals that they be free. They also maintained that a laissez-faire economy provided the best means of attaining the maximum satisfaction of wants. Let governments confine themselves, so the argument of the classical economists ran, to providing the legal institutions which protect the individual in his

right to engage in enterprise, own property, and enter into contracts, and to providing the facilities for the settlement of disputes between individuals. Government might undertake projects of unusual public significance, such as public works, but its major function is to preserve peace and security, protect private property, and provide a legal framework within which individual initiative could be maximized.

According to this theory, the production of goods is stimulated when every person seeks to maximize his personal income. In most cases this would mean that each person would have to sell goods or services to others. He must therefore decide what other individuals want (or what he thinks he can make them want), what price they will pay, and how much they will buy; then he must set about organizing the factors of production (labor, capital, and natural resources) to produce these goods or services. If he guesses right he is rewarded with profitable sales; if wrong, he is penalized by losses. Moreover, he is constantly induced to try to increase his profit by selling a greater volume or by reducing costs, or both. He has every incentive to improve his product or reduce his price to stimulate sales, to use the most efficient methods, and to invent new methods whereby more goods can be produced with the same resources or the same amount with fewer resources. Moreover, so the theory goes, everyone will tend to do those things for which he is best fitted, and society as a whole will benefit. Thus the "unseen hand" transmutes individual selfishness into social benefit, and enterprisers are rewarded in proportion to their contribution to the satisfaction of wants of others.

All economic systems (except a Robinson Crusoe economy) are cooperative ones—that is, everyone cooperates in satisfying the wants of everyone else. This cooperation may be directed and guided by an authoritarian government under a national plan, in which society has no discretion other than to produce and consume goods in conformity with the official blueprint. The decisions are made by a central authority, and individuals are only cogs in the economic machine. A free enterprise society appears at first sight to be much less neat and orderly—if not positively chaotic—with tens of millions making their own little

individual economic plans and no superior agency to bring them into line.

But this "decentralized planning" is not chaotic, as every student of economics knows. It is regulated by the "price system." Prices are the guides to economic activity. They are the signals which flash increased or decreased demands or supplies of individual goods. They are the "election returns" when the consumers, of their own free will, cast their dollar ballots over the counters everywhere and tell producers what they want or do not want. The consumer is king and the price system registers his decrees. He who correctly anticipates the wants of others and can produce and sell on advantageous terms will profit and will be permitted to use productive resources for that purpose. He who fails to sense consumers' wants or produces inefficiently is penalized by losses and thus is stopped from using productive resources. For these productive resources, too, have prices which represent their usefulness to society in more important ways, and inferior uses are penalized by losses.

And, finally, a free enterprise society divides its total product among the cooperating participants in accordance with their marginal contribution to the productive process. The skilled physician, the gifted author, the able executive, command dollar incomes which permit them to enjoy larger real incomes in goods and services than others whose marginal contribution is smaller. Thus some persons have more influence in determining the direction of production than others, but this feature is justified by most observers, except confirmed equalitarians, on the ground that those who make a greater contribution to society are entitled to a larger share of the income, and it is necessary to provide these individuals with the incentives to greater effort, greater sacrifices, and greater ingenuity without which economic progress and development would be slowed down. It is perhaps in the distribution of the fruits of production that the system of free enterprise is most frequently criticized, partly because of prevailing inequalities, but also because some large incomes are derived from sources other than individual merit or social contribution. Our government has sought to remedy some of the inequalities by taxation, free public services, minimum-wage

legislation, social security, and other means; and it attempts to prevent "antisocial" incomes from being earned by laws against fraud, dishonesty, thievery, gambling, monopolization, blackmail, etc.

This is the rationale of the free enterprise system. The big question, however, is: How does the system work in actual practice? The answer is that the system works satisfactorily only when there is real and effective competition. For it is clear that individuals might profit by combining to raise the prices of their products or to reduce the prices of their raw materials or labor, thus obtaining a private gain for which there is no social benefit. If competition worked perfectly we could be much more sure of the beneficence of the system of free enterprise. But we have seen that perfect competition is, and always has been, an exception to the rule, for it can exist only when there is an unlimited number of sellers of a completely standardized product, and when there is complete mobility of the factors, of production, and each seller has complete knowledge of all market conditions, and each seller acts rationally. Seldom, in fact, are these conditions fulfilled.

Fortunately the defenders of laissez faire did not predicate their system upon the existence of perfect competition; in fact the theoretical conditions of perfect competition were set up not by them but by the economic theorists who followed them, and who have been prone to read back into the pragmatic and practical earlier writers abstract ideas which were not there. The "founding fathers" of the classical school (Smith, Ricardo, Mill, Say) expected the desired results of competition to flow from active rivalry among sellers which would lead them to charge low prices, improve goods, and produce efficiently. Competition benefits society, they believed; actual collusion, conspiracy and monopoly, on the other hand, are contrary to society's interest. They had in mind a sort of "workable" competition that is somewhere between the extremes of modern "pure competition" and "pure monopoly."

The indictment of monopoly on economic grounds is well known. Under a single control of supply, goods are sold at prices that are above marginal costs of production, since the monopolist maximizes profit when he equates marginal cost with marginal revenue. He profits from producing fewer goods than society wants at prices that cover marginal costs; thus he deprives consumers of goods that ought to be produced. By restricting employment, he shunts labor into less productive uses, reduces its price, or leaves it unemployed. If the monopolist happens also to be the sole buyer of a certain raw material or local supply of labor, he might still further reduce his output in order to obtain that raw material or labor at a lower cost. Hence consumers are deprived of the product they should have, the factors of production are deprived of a market for their services, society's resources are incorrectly used, and—what irritates most—the monopolist gets rich at it. And so, with the exception of certain legal monopolies—public utilities, patents, labor unions—our policy has been to suppress or discourage monopolization.

It is the vigorous and continuous antimonopoly policy in industry (not so much so in agriculture and labor, where government has encouraged combination) that distinguishes the American economy from the pre-World War II free enterprise systems of western European countries, where monopoly, combinations, and cartels were accepted or even promoted by government. It is small wonder that a strong tendency toward socialism overtook them, for there are only three ways of dealing with monopoly: by preserving and enforcing competition, by government regulation, and by state ownership and operation. Generally the United States has chosen the first alternative.

Devices for Monopoly.—The essential objective of monopoly is to control price, usually by withholding supply. Arrangements to control supply in a given market are numerous. Some monopolies are transient, some durable; some may cover only the retail stores of a prairie hamlet, others may cover the entire world. The list of forms of business combinations has previously been recited: outright merger or consolidation, stock control through the holding company or the trust (now obsolete), and the lease of productive facilities which may be so farreaching as to achieve monopoly.

Price or production agreements with complicated formulas for assigning and enforcing quotas or areas to individual producers (pools), or simple price or production agreements (gentlemen's agreements) covering domestic business only or extended to international markets (cartels), are more definite evidences of attempts at monopoly, for this purpose is the only reason for such agreements.

Sometimes a substantial degree of monopoly can be achieved without specific agreement or collusion. A dominant corporation in the industry may become a "price leader" and other firms may follow through self-interest or fear of retaliation. There may be understandings reached in informal discussions of problems common to the industry, such as the famous Gary dinners in 1907 and 1908, at which the head of the United States Steel Corporation urged upon the executives of competing steel companies the need to prevent destructive competition. Standard quotations of delivered prices (basing-point systems) may be adhered to by all producers, without specific agreement, as was the prevailing practice in the cement, steel, and many other industries until the Supreme Court in April, 1948, condemned this practice in the cement industry as a violation of the antitrust laws. Price cutting is sometimes avoided for fear of "spoiling the market" or where a few large firms fear each other's retaliation. Trade associations, although organized to furnish information, to improve conditions, and to promote the interests of an industry, inevitably bring competing producers together in some measure, and sometimes their published data about sales, prices, production, stocks, contracts, and freight rates, as well as their recommendations concerning such matters as trade practices and cost accounting, affect managements' price decisions. Occasionally trade associations have deliberately tried to control prices, and in some such cases they have run afoul of the law. However, much can be done by way of disseminating information before the courts detect a "necessary tendency" to restrain trade or create monopoly.

Many believe that it should be obvious to the rational businessman that cutting prices or improving quality is a losing proposition. Why cut prices or improve quality when your com-

petitor will do the same thing and both of you will be worse off than before? So agreement is not needed. In self-interest, it is said, presumed competitors follow a "live and let live policy" that is quite different from vigorous competition. The desire to maximize gain thus leads to restrictions on competition rather than to competition. Competitive striving is something for the economics textbook rather than the market place, it is suggested.

Yet we know that large concerns do compete, even when it seems to be against their long-run interests to do so, even where there are a few large producers who can retaliate against each other. Perhaps the best example is in the manufacture of automobile tires. The "big four" (Goodyear, Goodrich, Firestone, and United States Rubber) dominate the field; the many smaller producers account for only about one-fifth of the output. It is obvious that, since the cost of tires is a small part of the cost of operating a car, these companies could increase the volume of sales by producing a tire that would wear out faster, or could increase profits by keeping tire prices high. Yet they have done iust the opposite. Tires have improved in quality and fallen in price so that they now give about six times the mileage at half the cost per tire that they did in 1915. And price cuts and price wars are normal in the industry. Producers are even induced to compete with their own retail outlets by making tires, under other brand names, for chain stores and mail-order houses at small margins of profit. This practice makes competitive sense since each producer obtains a competitive advantage, although sometimes only temporarily, by improving quality, advertising his product, cutting prices, and making tires for outside big users and distributors. "If I don't somebody else will" seems to be the general attitude, and that is the essence of the competitive striving that has stretched the consumers' tire dollar, albeit at the cost of an uncertain and erratic profit record in the tire industry.

No standard set of conditions to be detected by counting the number of firms, discovering the existence of a trade association, pointing to a corporation that is large enough to be a price leader, or observing that all firms charge the same price in the same market, can be regarded as conclusive tests of monopoly. Some-

times even agreements to maintain price do not result in monopoly in fact. The history of such agreements, from the post-Civil War gentlemen's agreements and pools to the government-imposed uniformities under the N.R.A. in 1933-35 reveals that they are broken secretly or openly by individual firms that find opportunities for profit in making concessions while an umbrella is held over them by their competitors. Such contracts, without means of legal enforcement, commonly contain the seeds of their own destruction.

Other devices that may, but do not necessarily, lessen competitive action are interlocking directorships and "communities of interest" where officers, directors, or stockholders of rival corporations are closely bound together by the ties of family or business association, as the Rockefeller family after the Standard Oil dissolution in 1911. Here again the lines of control may be indistinct and the common directors or stockholders may or may not actually control corporate policy. Sometimes representatives of investment banks which specialize in the securities of a particular industry will sit on the boards of several competing corporations, but whether that diminishes competition appreciably depends upon the circumstances of each case. Sometimes the bankers are primarily advisers on financial matters or they may be there to protect the interests of investors to whom the firm has sold the corporation's securities. At other times they may exert a large influence in all phases of corporate policy.

History of Monopoly Regulation.—Distrust of monopoly had its earliest beginnings in the rules of trade in the medieval town economy where the law merchant forbade forestalling, engrossing, and regrating, which were practices designed to control the supply of goods coming to market. These rules became part of the common law. As the town economy gave way to broader areas of trade, and as the struggle between the king and Parliament developed, the crown became the target of antimonopoly sentiment. As early as 1603 a court had held invalid a royal grant of monopoly for the manufacture of playing cards. Twenty years later Parliament passed the Statute Against Monopolies, restricting the power of the crown to grant exclu-

sive privileges of manufacture or trade. In the course of time the restrictions directed at the king came to be applied by the courts to privately arranged monopolies, and the common law doctrine of "conspiracy to monopolize" became a powerful instrument to combat some of the more obvious devices for the suppression of competition. The Anti-Combination Act of 1799 specifically prohibited combinations in certain industries and among laborers, but the act was repealed after several decades and monopoly control was again left pretty much to the common law.

Along with the common law doctrine of "conspiracy to monopolize" went that of "restraint of trade," under which agreements not to compete were declared null and void. These contracts in restraint of trade frequently arose in connection with the sale of a going business, in which the buyer bought the good will or patronage as well as the other property of the business. In return the seller agreed not to engage in competition. Such a contract was held to be contrary to the public interest because (1) it limited the seller's freedom and opportunity to make a livelihood and (2) it deprived society of the benefits of his participation in competitive activity. It will be noted that such contracts were unenforceable at law, not illegal; they were "gentlemen's agreements" only. Gradually courts began to modify their earlier stand against all such contracts. If the agreement was part of a larger agreement of sale, and if it did not place unreasonable restrictions upon the seller's freedom to engage in trade at a future time or in another location, it might be held valid. Thus during the nineteenth century this "rule of reason" came to modify the doctrine of "contracts in restraint of trade" involving the sale of good will, but it was inapplicable where all members of an industry agreed not to compete.

These two rules were the heritage of common law that provided the framework for antimonopoly policy in the United States. There is, however, little evidence that a vigorous antimonopoly policy was followed by either the states or the federal government until the time of the Civil War. The problem of business monopoly does not seem to have loomed large in the early years of the republic. The federal Constitution is silent

about it. So, apparently, were most of the original state constitutions, although many of the newer states have constitutional prohibitions of monopoly. With the advent of larger corporate enterprises, and the movement in the 1870's and 1880's toward combinations, agreements, pools, and trusts, the common law notions of "conspiracy to monopolize" and "restraint of trade" became weapons which were at first sporadically used to combat monopoly. On the whole they were ineffective.

The growing industrialization, the long depression of the 1870's, the revolt of Midwest farmers in the "Granger movement," and economic insecurity and hard times for many, all led to attacks on "big business," particularly the railroads and the corporate giants or trusts that were created from 1879 to 1896 in the petroleum, linseed oil, sugar, whiskey, cottonseed oil, match, rubber, and leather industries. A few outstanding legal actions were taken by the states under the common law. The North River Sugar Refining Company was forced to forfeit its charter in 1890 for joining the Sugar Trust. Two years later the Supreme Court of Ohio declared that joining a trust to create a monopoly was not only an ultra vires act of itself, but was to be further condemned as unlawful because the attempt to monopolize was contrary to public policy; and the Standard Oil Company of Ohio was ordered to withdraw from the Standard Oil Trust. These decisions put an end to the use of trust device for combination, but the trusts merely organized themselves as holding companies under a statute that had been conveniently adopted by New Jersey in 1889, permitting corporations to own stock in other corporations, and to acquire it by exchange of their own stock.

The nonenforceability of price agreements and pooling arrangements under the common law had led to the creation of trusts and consolidations. Although the first of these was found legally vulnerable, the remaining forms of monopoly were not systematically attacked. Moreover, agreements to restrain trade were merely unenforceable at law, not illegal.

Agitation for action to control large corporations and trusts led to the enactment of state antitrust laws. Many new states inserted antimonopoly provisions in their constitutions. Others

passed antitrust statutes. By 1890, when the Sherman Act was passed by Congress, nearly thirty states had taken such action. The state antitrust laws made monopolistic agreements illegal and outlawed practices condemned under the common law. Many states prohibited specific activities, such as pooling, restraints of competition, and price agreements. Other practices, such as local price cutting, exclusive dealer contracts, and resale price maintenance, were made unlawful in a number of states. Penalties of fines and imprisonment applying to both the concern and its officers were provided in most cases, and the attorney general of the state was charged with the duty of enforcing the law. Today all but eight states have antitrust statutes.

These state laws were not generally successful. Enforcement in some states was haphazard and lax. Litigation was sometimes prolonged and costly, and even those states in which enforcement was energetic found themselves hampered by long legal battles. Seager and Gulick relate in dramatic fashion the long-drawn-out war between the state of Texas and the Waters-Pierce Company, a subsidiary of the Standard Oil Company, and a similar contest between the state of Missouri and the International Harvester Company.1 The most drastic penalty that was commonly imposed, if conviction finally resulted, was a fine and ouster. Although prevented from doing business in the state, the company could not be prevented from doing business across state lines, and sometimes new agents were set up to take the place of the old. Moreover, the people of the state would suffer by being deprived of the products that a corporation like the International Harvester Company sold, and so the ousters were commonly suspended.

The nation-wide scope of the activities of many of the largest trusts, the ineffective enforcement of most state laws, and the constitutional prohibition of state interference with interstate commerce made it clear by the 1880's that state laws were adequate to deal only with local monopoly and that federal legislation was necessary if uniform and effective action was to be achieved. Congress had not been insensitive to the antimo-

¹ H. R. Seager and C. A. Gulick, Jr., Trust and Corporation Problems (New York: Harper & Bros., 1929), pp. 351-361.

nopoly feeling that was in the air. In 1888 and 1889 committee investigations were authorized, bills introduced, and debates over methods, rather than objectives, held. Both major political parties favored monopoly-curbing legislation; and the Sherman Act was passed in July, 1890.

The provisions of the act were simple, yet sweeping in scope. No detailed list of unlawful activities was made. It has taken over half a century for the courts to decide exactly what the law makes illegal, and the end is not yet in sight.

Section I provided that "Every contract, combination in the form of trust or otherwise, or conspiracy, in restraint of trade or commerce among the several States, or with foreign nations, is hereby declared to be illegal." Similarly, Section 2 made it a misdemeanor to ". . . monopolize or attempt to monopolize, or combine or conspire . . . to monopolize any part of the trade or commerce among the several States, or with foreign nations." Punishment for violation of the law in the form of fines up to \$5,000 or one year in prison, or both, was provided. Additional penalties were the forfeiture to the government of any goods in interstate or international transit, and liability for triple damages sustained by any other person as the result of the law violation. Enforcement of the law was placed in the hands of the Attorney General, who could bring suit to enjoin as well as to punish violators.

Judicial Interpretation of the Sherman Act.—The real scope and meaning of the Sherman Act can be understood only in the light of court decisions. In an early case the Supreme Court held that the language of the act was broad enough to encompass a labor leader whose activities violated a court order enjoining him from interfering with interstate transportation by railroad. This case against Eugene V. Debs, 158 U.S. 600 (1895), was one of the first in a long history of cases in which labor unions were tried for violating the antitrust laws. Recent Supreme Court decisions have all but exempted union activity from the law, except where they are in collusion with employers. Although the law was aimed primarily at industrial monopolies,

its language clearly implied that all contracts, all attempts to monopolize interstate or foreign commerce, were unlawful.

But the Supreme Court in its first decision construing the Sherman Act in 1895 held to such a narrow definition of interstate commerce that it looked as if manufacturers might escape its impact. It refused to interfere with the American Sugar Refining Company, in its acquisition of four competing refineries, including the E. C. Knight Company, 156 U.S. 1 (1895), on the ground that manufacturing precedes interstate commerce and is not a part of it. Those who thought that this decision made the act almost useless had to change their minds a few vears later when in the Addyston Pipe and Steel Company case, 175 U.S. 211 (1899), the court held illegal a combination of cast-iron pipe manufacturers who had a pooling arrangement that gave each manufacturer the exclusive right to sell in a given area. To conceal this agreement fictitious bids were submitted by competitors whose prices were always set so high that the "right" seller got the business. Here it was clear to the court that commerce, not manufacturing, was involved and this combination was held to be illegal.

The question of whether or not the prohibitions of the act applied to railroads was also settled by the Supreme Court in two decisions in 1897 and 1898. The law seemed to state that all contracts and combinations were illegal. But there was some doubt about its applicability to the railroads since Congress had passed comprehensive legislation regulating railroads in 1887. Moreover, the Trans-Missouri Freight Association, which was under attack, was organized by railroads in the Southwest to bring an end to "ruinous" competition (from which they all suffered) through agreement on reasonable rates and rules of operation. The railroads contended that the law did not forbid "reasonable" restraints. By a five-to-four decision, in 166 U.S. 290 (1897), the Supreme Court held that railroads were subject to the act, and it refused to draw a line between reasonable and unreasonable restraints of trade; the word "every" in the act, it was held, covered all restraints of trade. This same line of reasoning was used to condemn a similar combination of railroads in the Joint Traffic Association case, 171 U.S. 505

(1898). The view of the court minority that the law forbade only unreasonable restraints of trade was not accepted by the majority until 1911.

The first decade thus saw much uncertainty in the enforcement of the law. Until the Addyston decision in 1899 undid some of the effects of the decision in the E. C. Knight case, it seemed that combinations of manufacturers might proceed without undue fear, and the second great period of business combination took place in the closing years of the 1890's and the early years of the new century.

Public hostility to the "trusts" soon flared anew and President Theodore Roosevelt launched an antitrust program that called for the creation of the Bureau of Corporations to investigate large corporations and for the infusion of new vigor into the enforcement of the Sherman Act. In 1904 the Supreme Court, in the Northern Securities case, 193 U.S. 197, rendered its opinion concerning the status of holding companies under the Sherman Act. The Northern Securities Company had been organized in 1901 to own the stocks of the Great Northern and Northern Pacific railroads, which in turn owned nearly all of the stock of the Chicago, Burlington and Quincy, over whose lines both railroads reached Chicago. Earlier in that year the Hill-Morgan interests had nearly lost control of the Northern Pacific to E. H. Harriman who, desiring the Burlington as a feeder line for his Union Pacific system, had secretly bought Northern Pacific stock in such large amounts that he brought about the famous "corner" of the stock in early May, 1901. To prevent a possible repetition of this threat of disruption, the holding company was organized under the laws of New Jersey. It acquired most of the Great Northern and Northern Pacific stock held by the Hill-Morgan interests by issuing its stock in exchange. Since the two railroads operated parallel lines from the Mississippi River to the Pacific Northwest, they were competitive. The government attacked the company and asked for its dissolution. The company defense was that it was empowered by a sovereign state to hold stocks, and that this power could not be impaired by the federal government. The lower court decided against the company and a divided Supreme Court sustained the decision, on the ground that although the holding company was legal in form, it could not be used as a device to violate the law. Since most of the "trusts" were organized as holding companies, the decision was far-reaching in its effects. No longer could a holding company chartered by a sovereign state be thought of as a refuge for the monopolist.

In 1911 the Supreme Court dealt another blow to monopolistic corporations when it ordered the Standard Oil Company of New Jersey, 221 U.S. 1, and the American Tobacco Company, 221 U.S. 106, dissolved. These decisions reaffirmed the lack of immunity of holding companies and re-established the vulnerability of combinations of manufacturers. In these cases the court announced its famous "rule of reason," holding that only contracts and combinations which "unreasonably" restrain trade were unlawful. This doctrine, originally suggested by the minority in the Trans-Missouri case, was to give a new slant to the application of the antitrust laws. But the oil and tobacco monopolies had indulged in so many kinds of overt acts injuring competitors and enhancing their monopolistic positions that they were found guilty of unreasonably restraining competition.

In the same year the DuPont Company, a powder trust, was ordered broken up into three constituent parts, 188 Fed. 127. The General Electric Company accepted a consent decree in which it agreed to discontinue monopolistic practices in the manufacture and sale of electric light bulbs. The court also struck down resale price maintenance by the Dr. Miles Medical Company, 220 U.S. 373.

But the precise tests of illegal monopoly were not yet apparent. Even the trust-busting tactics of the Roosevelt administration did not seek to reduce all corporations to small size. The distinction between "good" and "bad" trusts was made, and in one case, 224 U.S. 409, an illegal combination of railroads operating a terminal in St. Louis became legal by the inclusion of its complaining competitors on equal terms.

The tide was running strongly against monopolistic practices, not only in court decisions but in new legislation, for in the fall of 1914 the Federal Trade Commission Act and the Clay-

ton Act were passed to provide for more adequate enforcement of the Sherman Act and to make unlawful specific practices which led to monopoly, but were not in and of themselves previously illegal. We shall examine the acts a little later.

After 1912, the judicial construction of the Sherman Act took a turn that seemed to be more tolerant of big business, as the Supreme Court tended to emphasize the abuse of monopoly power more than its existence, and to stress overt acts rather than size. In the Winslow case, 227 U.S. 202 (1913), the United Shoe Machinery Company, which controlled over 95 per cent of the shoe machinery industry, partly through patents, was held blameless because it had not used its power oppressively. Even the American Can Company, which at one time accounted for about 80 per cent of the industry, was not ordered dissolved by a lower federal court. Perhaps the Supreme Court reached a new high in defense of corporate size against charges of monopolization in refusing to dissolve the United States Steel Corporation, 251, U.S. 417 (1920), despite the fact that the company, at the time of its organization in 1901, controlled about two-thirds of steel-making capacity and had taken the lead in bringing its smaller competitors into closer understanding and cooperation through the "Gary dinners." But the court found that the corporation's competitors had grown faster than it had, and that it had never in fact achieved monopoly. It is true, observed the court, that the corporation was huge in size, but mere size does not make it illegal; there must be evidence of overt acts as well. The price agreements and the Gary dinners of its earlier years were unlawful but these had been discontinued before prosecution began. Finally the court could find no public interest that would be served by the dissolution.

Seven years later the court reiterated its opinion that "mere size is not an offense" when it refused to dissolve the International Harvester Company, 274 U.S. 693 (1927), representing nearly two-thirds of its industry. Size, if coupled with efficiency and fair dealing rather than with tactics that are oppressive to competitors and consumers, is not unlawful. The rule of reason seemed to apply to the results or abuse of monopoly power rather than its existence.

But the notion that the "rule of reason" makes any "reasonable" combination legal proved to be an illusion. In 1927 the Supreme Court, with three dissents, held in the Trenton Potteries case, 273 U.S. 397, that it was unlawful for twenty-three companies making 82 per cent of all sanitary plumbing fixtures to agree on sales prices and channels of distribution. The vice of the arrangement was that "the power to fix prices, whether reasonably exercised or not, involves power to control the market and to fix arbitrary and unreasonable prices. . . ." It is the extent of the power to fix prices, not the reasonableness of the prices fixed, that is the test of illegality, and where this power is extensive, the restraint of competition becomes unreasonable. Justice Stone, who delivered the majority opinion, cited the court's position in the Trans-Missouri, Joint Traffic Association, and Addyston Pipe cases, contending that that position had not been modified by the enunciation of the "rule of reason" in the oil and tobacco decisions.

With the advent of the Great Depression, public opinion concerning price agreements took a different slant. Falling prices, unemployment, falling wages, and business failure were all attributed in part to the ruinous and cut-throat competition, and to the operation of the "law of the jungle" and "dog-eat-dog." Excessive competition became the culprit, and although "big business" was criticized by the New Deal, its early economic philosophy seemed to sanction substantial restraints on competition, both in the hope that it would raise prices and so promote recovery, and that it would help farmers, laborers, and small businessmen.

Even the Supreme Court seemed to find less harm in agreements among competing concerns, or perhaps it became conscious of its inconsistency in permitting restraints of competition through growth in corporate size which it denounced as unlawful if accomplished through agreement. In any case, shortly after the first inauguration of Franklin D. Roosevelt, it handed down its decision in the Appalachian Coals case 288 U.S. 344 (1933), holding that it was lawful for a number of bituminous coal-producing companies in the Pocohontas region to set up a central selling agency with authority to fix prices for all of

them. This was done to cope with the distress that was caused by overproduction, lower consumption, and organized buying. Despite the fact that the selling agency covered 73 per cent of the commercial production in the immediate region, it sold most of its output to outside (and competitive) regions and since it represented only 12 per cent of total production, it lacked the power to fix all soft coal prices. Thus it did not "unduly restrict" competition, and so differed from the Trenton Potteries case in which the combination actually had the power to fix prices. "The mere fact that the parties to an agreement eliminate competition between themselves is not enough to condemn it," wrote Chief Justice Hughes, and he further contended that the "statute does not prevent persons from making an honest effort to remove abuses, to make competition fairer, and thus to promote the essential interests of commerce." Significantly, he added this thought: "We know of no public policy, and none is suggested by the terms of the Sherman Act, that, in order to comply with the law, those engaged in the industry should be driven to unify their properties and businesses in order to correct abuses which may be corrected by less drastic measures."

With the demise of the N.R.A. through the Supreme Court decision in the Schechter case, 295 U.S. 495 (1935), holding that the codes of "fair competition" constituted an unlawful delegation of congressional power, a new wave of antitrust sentiment emerged in Washington. The late 1930's brought another of the periodic antitrust crusades that, with some interruption during World War II, has continued to the present time. Practices that were sanctioned or imposed by the N.R.A. codes came to be attacked as monopolistic, the outstanding instance being the prosecution of oil refiners for price-fixing practices said to have been started under the industry's N.R.A. code. The Supreme Court, in the Socony Vacuum Oil case, 310 U.S. 150 (1940), held that such practices were an unlawful restraint of trade and seemed to cast a more critical eye on all price agreements, even those designed to remedy "abuses," than it had done seven years previously in the Appalachian Coals decision. However, the two decisions can quite easily be reconciled in principle, since the market area affected by the restraint in the oil industry was considerably greater than that in the soft coal industry.

In general, court decisions applying the antitrust laws during recent years have become more unfavorable to restrictive activities of all kinds. The one exception is in the field of organized labor, where the Supreme Court has virtually exempted the activities of labor unions from the provisions of the antitrust laws, thus modifying a long judicial tradition that runs back to the Debs case in 1895.

The attempt by Thurman W. Arnold, Assistant Attornev General 1938-43, to end certain kinds of restraints of trade imposed by labor unions was stopped short by the courts. Arnold sought to bring to an end such union practices as the prevention of the use of more economical methods and materials, the hiring of unnecessary labor, participation in commodity price-fixing schemes, and jurisdictional strikes. Restraints of trade brought about by strikes to force union recognition, raise wages, or improve conditions were recognized as legitimate and legal, and even secondary boycotts (which earlier had been ruled unlawful by the Supreme Court) were not attacked. In the ensuing litigation, the Supreme Court ruled in 1939 that a labor union was guilty when it conspired with a combination of milk producers in Chicago to exclude from the market those not parties to a price-fixing arrangement. In a decision in May, 1947, a federal court in Los Angeles convicted a group of fishermen, organized as a C.I.O. union, for attempting to fix the price of fresh fish sold to dealers. And in July, 1948, a New York federal court ruled that the American Society of Composers. Authors and Publishers (A.S.C.A.P.) was guilty of violating the antitrust laws in exacting a special fee from theaters showing films containing A.S.C.A.P. music.

In practices other than those to fix commodity prices, labor unions have won almost complete freedom from the antitrust laws. In the Hutcheson case, 311 U.S. 463 (1941) the Supreme Court, repudiating Mr. Arnold's contention, held that a strike and boycott in a jurisdictional dispute between the carpenters' and the machinists' unions did not violate the antitrust laws. The majority of the court cited provisions of the Clayton

Act and the Norris-LaGuardia (anti-injunction) Act as expressing the intent of Congress not to restrict union activity. In a dissenting opinion, Justice Roberts pointed out that this view had been repudiated by the courts in a long series of decisions and by Congress, which on many occasions had refused to grant labor unions the immunities the court gave them by this decision. He accused the majority of "legislating." Similarly, the Supreme Court refused to apply the antitrust laws so as to interfere with sitdown strikes; nor did it find guilty a teamsters' union which by threat of violence had forced trucking firms from outside New York City to hire a stand-by union driver or pay the union for the privilege of driving a truck into the city. The latter action was brought under the Anti-Racketeering Act which has since been strengthened.

One of the most noted decisions in recent years shows that the Supreme Court no longer holds to the doctrine that "size is no offense." After a period of litigation beginning in 1937, the government finally won a decision against the Aluminum Company of America, which has long almost completely dominated that industry in the United States, first through patents and then through control of the richest deposits of bauxite. In 1945 a three-judge New York circuit court (acting as the Supreme Court, since four justices of the Supreme Court disqualified themselves for having participated in previous litigation) reversed the decision of the New York district court and held that the company had a monopoly through effective control over about 90 per cent of the supply, and that even though it did not deliberately act to exclude competitors or to monopolize it was still a monopoly in fact. However, the court did not order the company dissolved since new large competitors in the form of the Reynolds Metals Company and Permanente Metals Company were operating huge government-financed war plants, and the postwar competitive situation could not then be foreseen. [148 F. 2d 416 (C.C.A. 2nd, 1945).] As the result of this decision, complete domination of an industry because of sheer size, no matter how attained or what the objectives, seems to have become more questionable.

But one cannot be sure where the line will be drawn. 'The

Attorney General did not disapprove of the sale of the government's giant steel plant at Geneva, Utah, to the United States Steel Corporation, and in June, 1948, the Supreme Court in a five-to-four decision refused to upset the district court's finding that the sale of the Consolidated Steel Corporation to Columbia Steel Company (a U. S. Steel subsidiary) was not in violation of the Sherman Act. The Justice Department had fought the acquisition of the independent western steel producer by U. S. Steel. The court held that the two companies had not been in active competition, and the transaction was sound from a business point of view, particularly because the plant could be integrated with the Geneva mill.

Need for Further Antitrust Legislation.—Although the Sherman Act provides the basic foundation for our antitrust policy, several amendments and supplements have been found necessary to strengthen it, broaden its scope, and implement its enforcement. In addition, miscellaneous legislation has limited its application with respect to certain practices or even to entire areas of economic activity. We are primarily interested in the amendments designed to improve the effectiveness of action against monopolistic practices.

From the beginning it became clear that the Sherman Act, like any law, was only as good as its enforcement. Congress had charged the Attorney General and the district attorneys with the responsibility of enforcing the law, but it was only one of many laws, and little separate attention was given to it. Only in the office of the Attorney General has a separate legal staff been charged with the special task of antitrust law enforcement, and it was frequently too small or too little inclined to take aggressive action. Even at the time of Theodore Roosevelt's "crusade" the antitrust division was composed of only five lawyers and four stenographers. From 1914 to 1923 there were only eighteen lawyers in the division. In recent years the staff has been greatly enlarged, and in 1940 Thurman Arnold had 190 attorneys in the antitrust division.

Other difficulties became apparent. The problem of monopoly and its detection is primarily economic, but the original

law provided no agency for the study of industrial practices or economic fact finding, nor did it provide for any kind of supervisory agency to see that practices, once enjoined, would not be repeated. Here and there flagrant cases of violation would be attacked, but enforcement tended to be sporadic where uniformity and consistency were needed for the benefit both of industry and the public. This need was partly filled by the creation of the Bureau of Corporations in 1903, whose major function was to make studies of the practices in various industries, particularly where monopolistic practices were suspected. The bureau did proceed to make some of the best industrial studies in our history, and its activities provided the Attorney General, Congress, and the public with much challenging factual information about the "trusts." But there its functions ended: it had no power to take action against what it found. Its revelations about the tactics of some of the combinations made it apparent that if competition was to be preserved, something had to be done to curb the practices by which competitors were harassed for the purpose of making them surrender to the combine. Volumes could be, and have been, written about the tactics used by monopolies to extend the scope of their power. Frequently they failed in their objective because competition could not be permanently suppressed, or because the economic conditions in the industry were not conducive to monopoly profits.

Yet even where eventual failure resulted, it was only after a struggle in which many small concerns were the victims of practices that were unethical as well as uneconomic. And the cases in which these methods were successful for the monopolist were far too numerous to be ignored by those who would preserve competition and protect the right of the "small fellow" to conduct his business without harassment from the "big bully" around the corner. It became apparent that the law must do more than prohibit monopolies and restraints of trade: it must also prevent the kind of practices that were not of themeslves unlawful, but could be used to crush competition or promote monopoly. The remedial legislation took the form of the Federal Trade Commission Act and the Clayton Act which became effective in September and October of 1914, respectively.

Federal Trade Commission Act.—This act had as its essential purpose the creation of a "policeman of industry" and the establishment of rules of the game by making "unfair methods of competition" illegal. It created the Federal Trade Commission, composed of five members appointed for a term of seven years by the President and subject to Senate confirmation. The Commission succeeded the Bureau of Corporations whose investigatory functions it took over. It was empowered to investigate all corporations engaged in interstate commerce (except banks and common carriers), particularly those alleged to be guilty of violating the antitrust laws. It was to act upon the request of the President or either house of Congress, to make recommendations to the Attorney General for the breaking up of monopolies, to advise the courts upon the form of dissolution decrees, and to report on their effectiveness.

Its direct powers to control monopoly stem largely from its control over "unfair methods" of competition, which were made unlawful under Section 5 of the act, and from its coordinate authority, with the Department of Justice, to enforce the provisions of the Clayton Act. Since unfair methods are nowhere defined by Congress, the commission, guided and checked by court decisions, has occupied an area of industrial practice that is wide in scope. Its powers over unfair methods of competition have been used so extensively that their impact is in some respects greater than that of the antitrust laws themselves. Its cease-and-desist orders (originally enforceable only by court mandate, but since 1938 binding after sixty days) have helped mold modern industrial and commercial practice to a very great extent.

The Clayton Act.—This act took the form of an amendment to the Sherman Act and is a part of the basic antitrust law. Its purpose was to make illegal certain practices that had led to trust creation, and to suppress tactics that had been used by monopolies but could not be reached under the original law. Section 2 forbade price discrimination between purchasers except where justified by differences in cost or quantities, or to meet competition. Section 3 forbade contracts for sale or lease that excluded

the right to buy or use a competitor's product. This prohibited "tying contracts" whereby the owner of a patented article could force a user or buyer to take his entire line of goods, thus effectively blocking competitors. Section 7 forbade intercorporate stockholding for purposes of control in the future. Section 8 forbade interlocking directorates of corporations (other than banks and common carriers) that have been in competition, if any one of them has capital, surplus, and undivided profits of \$1 million or more. The Board of Governors of the Federal Reserve System is empowered to make rules and regulations governing interlocking directorates for banks, and to supervise the enforcement of the act as it applies to banking institutions. The Interstate Commerce Commission enforces the act as it applies to common carriers.

One of the most important qualifications to the above prohibitions is that they are unlawful only when their effect is to "substantially lessen competition or tend to create a monopoly." This is a question of fact that is not easily determined.

Offenses are punishable by fine, imprisonment, or both, and an attempt is made to encourage private suits against monopolistic practices by permitting individuals and concerns to sue for injunctive relief or for triple damages. Under the Sherman Act injured competitors may sue to procure triple damages, but injunctions can be sought only by the government.

Other sections of the law have to do largely with legal procedure and the power of the courts to enforce and review orders of the Federal Trade Commission issued under the law. In these proceedings the courts are bound to respect the commission's findings of facts.

Section 6 declares that "the labor of a human being is not a commodity or article of commerce. Nothing contained in the anti-trust laws shall be construed to forbid the existence and operation of labor, agricultural, or horticultural organizations, instituted for the purposes of mutual help and not having capital stock or conducted for profit. . . ." This is the controversial section under which labor unions have sought exemption from the antitrust laws, although the traditional view has been that Congress merely intended to clarify and verify the then accepted

legal principle that combinations of laborers or farmers were not illegal per se, but some of their activities might be.

Policies and Activities of the Federal Trade Commission.— Even a brief account of the activities of the Federal Trade Commission would involve a lengthy discussion of commission orders, court adjudication of issues, and details far beyond the scope of this chapter. For purposes of perspective, it is perhaps sufficient to note that the most important result has been to provide for continuous supervision and policing of business practices, the early detection of monopolistic practices, and to establish a qualified body to make economic investigations that aid in antitrust enforcement and in the making of policy.

The path of the commission has not always been an easy one. Its orders have sometimes been reversed by the courts; it has been accused of making irresponsible charges that have injured firms that are innocent of wrongdoing; and even its own members have sometimes accused it of following such an arbitrary and inconsistent policy that businessmen have often been uncertain whether their acts were lawful or not. The commission, as a matter of policy, does not render advisory opinions. Those likely to be affected by a certain act cannot determine in advance whether it will be approved or disapproved by the commission. As in other affairs of life, businessmen have to follow their lawyer's advice, which is likely to be reliable only if there are legal principles clear enough for a reasonably intelligent lawyer to follow.

The big question, however, is not whether some uncertainties remain, nor even if there has been occasional unfairness in enforcement, but whether the acts have helped materially to prevent monopoly or otherwise protect the public, while preserving efficiency and flexibility in industrial life. A short sketch of commission activities will indicate how that agency has supplemented the work of the Department of Justice which has primary responsibility for the enforcement of the Sherman Act.

The major activities of the Federal Trade Commission are those concerned with preventing unfair methods of competition. Its staff monitors radio advertising and keeps a continuous

check on magazine and newspaper advertisements. It also receives complaints from those injured by misleading advertising. For instance, in its 1938 Annual Report, the commission reported 1,800 investigations upon applications for complaint. It approved 576 stipulations to discontinue the practices, of which 376 were for misleading advertising. It issued 305 complaints, of which 288 were under Section 5 of the Federal Trade Commission Act (unfair competition), 16 under Section 2 (price discrimination), 3 under Section 3 (tying contracts), and 1 under Section 7 (stock acquisition) of the Clayton Act. It issued 246 cease-and-desist orders.

The commission has consistently fought misbranding of merchandise, simulation of trade names, false claims to indorsement, and misrepresentation of quality, origin, or trade status. It has issued many cease-and-desist orders against bribery of competitors' employees or customers, against false and misleading statements about competitors, against harassment of competitors by threatening litigation or causing expense. It has also opposed resale price maintenance, the use of basing-point systems of price quotation, the enforcement of the regular channels of trade, and the use of lotteries to promote sales. On the whole, its orders have been upheld by the courts, but in some cases it has been reversed. The courts have held that the commission can prohibit only those practices which affect the public at large, which are shown to affect competition, and which are characterized by bad faith. Mere private squabbles between competitors are to be settled by private litigation, not by commission orders.

Under the Raaladam decision, 283 U.S. 643 (1931), the Supreme Court ruled that it was not an unfair practice to sell harmful drugs because there was no legitimate competitive interest to protect. Under the Wheeler-Lea Act of 1938, the commission's authority over deceptive practices and false advertising of food and drugs was strengthened. The act made unfair or deceptive practices unlawful as such, regardless of the effect upon competition, and thus extended the protection of the law to the consumer. Moreover, the act made it a criminal offense, subject to stiff fines or imprisonment, to falsely advertise foods,

drugs, cosmetics, or curative devices, and the commission may seek a court injunction against such advertising pending the issuance of a cease-and-desist order.

In its orders under the Clayton Act, the commission has had only partial success. Under Section 2 the commission has opposed all price discrimination based on trade status, but the courts have held that only where those discriminations affect competitors is the law violated. The whole problem of quantity discounts came to the fore during the Great Depression, when there was increasing resentment against the concessions made by manufacturers to large buyers, particularly the chain stores. The Robinson-Patman Act was passed in 1936 to remedy this favoritism. This act authorized the commission to control quantity discounts and other buying concessions by limiting discounts, regardless of differences in cost or quantity, which promoted monopoly or were unjustly discriminatory. Under this provision the commission has issued many orders against special discounts and allowances to a few giant concerns, and the Supreme Court ruling in the Morton Salt case, 334 U.S. 37 (1948), sustained its attempt to limit the buying advantages that can be exploited by large corporations.

The commission's orders under Section 3 have been generally successful. The provision was aimed specifically at the country's largest manufacturer of shoe machines. This company forced shoe manufacturers to use its machinery exclusively if they used any patented machine. After the courts had found that this did not violate the Sherman Act, Congress made it specifically illegal, and the court upheld the commission's order for its discontinuance. Moreover, contracts under which dealers were precluded from handling competitors' products (said to have been used extensively by the farm machinery combine to exclude competition) came under the ban of Section 3, but in the Curtis Publishing Company case, 260 U.S. 568 (1923), its effect was modified when the Supreme Court held that the restriction did not apply to exclusive agency contracts when the agent devoted all of his efforts to one product.

The prohibition against intercorporate stockholding and interlocking directorates (Sections 7 and 8) has not been fully

effective. The courts have held that the merger of assets is not prohibited by law, and even if stock acquisition is a step toward merger, it is not under a legal cloud unless the complaint or order was issued before merger was completed. Moreover, the Supreme Court has held that a large St. Louis shoe manufacturer was not violating the law in acquiring the stock of a New England maker of shoes, where competition between the two firms had been slight. The commission has repeatedly asked Congress to extend its powers so that it can control combination through merger, but the legislation has not been passed to date.

The commission has tried to make its services easily available to the public. It may make investigations on its own initiative or upon a request from anyone. If a preliminary investigation discloses ground for action, it may issue a formal complaint against the person or corporation involved, and set a time for a hearing on the complaint. If the commission finds that the law is being violated, it may issue an order to cease and desist, which unless set aside by a court becomes binding after sixty days. However, many of its cases do not go through this formal procedure. Since 1919, it has been the practice of the commission to invite industries, through "trade practice conferences," to set up standards of business practice to which all would adhere. The commission, of course, must approve the rules, some of which (Group I) cover "unfair methods" which are unlawful, and some (Group II) are merely expressions of sound practice by the industry. Thus a certain amount of self-regulation is brought about.

The commission has also made its procedure somewhat more preventive and less punitive by permitting a business concern to stipulate compliance with the act by discontinuing the questioned practices. This saves the commission and the concern the expense and trouble of long litigation and does not subject the latter to unfavorable publicity.

The development of commission policy in two areas has been of special interest. One has been the commission's long and consistent fight against the practice whereby manufacturers seek to control the retail prices of their products (resale price maintenance); the other has been the use of delivered prices, par-

ticularly basing-point systems. Both have been attacked as unfair methods of competition.

In the first area the commission was partially successful until the enactment of fair-trade laws by some forty-four states (led by California), and the federal Miller-Tydings Act of 1937 in effect pulled the rug from under its feet. Even before the commission existed, the courts had held that resale price agreements were illegal under the antitrust laws. However, where there was no agreement or contract, attempts to maintain resale prices by "suggestion" were held to be lawful, and a company was within its rights in not selling to those who failed to follow the suggestion; so said the Supreme Court in the Colgate case, 250 U.S. 300 (1919), in upsetting a commission order. Later, in the Beech-Nut case, 257 U.S. 441 (1922), the Supreme Court, reversing a lower court, upheld a commission order against a company which had used a system of dealer cooperation, but no specific contract, to enforce a retail price policy that involved price maintenance. The court held that this practice went too far in the direction of restraining competition, and the decision was followed until state and federal fair-trade laws virtually took the matter out of the hands of the commission.

The fair-trade laws reflected a rather prevalent sentiment that a manufacturer has a right to protect his market by refusing to sell to "price cutters" or "chiselers" who sought to use the good will he had built up for his product for their selfish interests by selling it as a "loss leader." This was particularly true of large retailers like chain stores and mail-order houses. Small retail dealers complained loudly about the practice, and frequently refused to handle the goods. For years the American Fair Trade League had sought legislation to permit manufacturers to impose retail prices on their products, but it was not until the depression years of the early 1930's that sentiment against price cutting, and alarm at the plight of the small retailer became strong enough to support a succession of state laws, capped by the federal Miller-Tydings Act, which permitted both intrastate and interstate price maintenance in fair-trade states.

It will be noted that the laws do not permit competing pro-

ducers to agree on retail prices; in fact many of the laws, including the Miller-Tydings Act, permit this practice only when the price-maintained product is in active competition with similar products. On the other hand, the laws set no standards for fair prices but left them to the discretion of the manufacturer, who presumably would fix his price in light of the prices of competing products. Thus for fair-traded articles price competition can exist only at the manufacturer's level.

How seriously these privileges interfere with competitive pricing in general is not easy to determine. Most producers probably do not attempt to fix retail prices of their products, and even where they do—as in books and drugs, for example—devices for getting around the laws have been stimulated. In any case, the commission's attempt to keep clear the channels of price competition at all levels has been repulsed by fair-trade laws.

In the second area—basing-point pricing—the commission's efforts have finally been crowned by a signal triumph, for the Supreme Court in April, 1948, ruled that the Cement Institute and seventy-four cement companies were guilty of an unfair method of competition, which discriminated against buyers, in quoting delivered prices at destination rather than prices f.o.b. the mills. [Federal Trade Commission v. Cement Institute et al., 333 U.S. 683 (1948).] The court also implied that such systems might violate the Sherman Act.

This system of delivered pricing was probably most widely practiced in the steel industry, which under the leadership of the United States Steel Corporation charged uniform delivered prices in all markets. At first the price was the Pittsburgh price plus freight to destination—hence "Pittsburgh plus"—no matter whether the steel happened to have been made there or in mills located in Chicago; Birmingham, Alabama; Sparrows Point, Maryland; or anywhere else. Upon the order of the commission in 1924 this system was abandoned, but a new multiple basing-point system developed, with delivered prices being quoted from the nearest basing point (plus freight charges). By 1927 there were twenty-nine basing points from Los Angeles to Worcester, Massachusetts, and the number had grown to forty-eight in 1938. In August, 1947, when the commission brought new

charges against the industry, the number of basing points had increased to about ninety.

After United States Steel had complied with its order in 1924, the commission intermittently carried on its campaign against basing-point systems, but its effectiveness was probably lessened by the Supreme Court decisions in the Cement and Maple Flooring cases in 1925, in which both trade associations were absolved despite the publication of price and freight quotations. However, in the antitrust movement of the late 1930's these systems were brought under a new attack by the commission. It received a setback when a majority decision of the Seventh Federal Circuit Court in 1946 held that the Cement Institute and the cement producers were not guilty of conspiracy or price discrimination in using a system of delivered prices. It was not until the Supreme Court reversed the circuit court and decided the issue in favor of the commission that the legal status of its orders in this and half a dozen other industries was clarified.

That the decision will have far-reaching effects upon the price policies of other industries, there can be no doubt. Some that are said to follow basing-point systems, in whole or in part, such as steel, firebrick, white lead, steel chain, metal lath, glass containers, lime, lumber, paint, soil pipe, road machinery, liquefied gas, and others, will have to reconsider their price policies in light of the Cement Institute decision.

Impact of Recent Court Decisions.—The net result of recent court decisions seems to have been a stricter interpretation and application of our antitrust statutes. Not only has the court continued a long tradition in condemning specific agreements among competitors to fix prices or control output (providing they cover enough of the supply to be considered an "unreasonable" restraint), but it has brought size itself within the ambit of the law, and relieved the government of having to prove intent to monopolize, conspiracy, or show overt actions to restrict competition or coerce competitors. Complete domination because of size is now suspect. Moreover, the Supreme Court seems ready to give weight to the facts of the market place, and is less inclined to demand complete proof of conspiracy by agreement where uni-

form pricing policies are concerned. Thus even "follow the leader" pricing under which there is no conclusive legal proof of agreement or collusion may become vulnerable, particularly if such practices as uniform competitive bids or the maintenance of an elaborate structure of basing-point prices are found. Actual price practices rather than proof of conspiracy have been given new emphasis, and the practical effect is to place upon industries following such practices the burden of proving their innocence. This, of course, makes it much easier to indict and convict. The leaders of the steel industry could probably honestly testify before the Federal Trade Commission that their firms were not parties to any agreement or conspiracy to fix prices of steel. But after the Cement Institute decision, they capitulated and abandoned the basing-point system of pricing because they realized that its very existence was likely to be evidence of violation of the law.

Similarly the court has given the Federal Trade Commission a wide range of authority in controlling purchase discounts to large firms under the Robinson-Patman Act by ruling in the Morton Salt case that such discounts are illegal when the commission finds that there is a "reasonable possibility" that the discounts will harm or lessen competition, or if the grantor has not sustained the burden of proof that they reflect savings in cost.

Trade Association Activities.—The legality of forms of cooperation other than agreements or combinations deserves brief mention. The chief of these is the trade association. Hundreds of these organizations exist, each to promote the interests of a particular industry. Some of the larger and better known are the American Iron and Steel Institute, the National Automobile Chamber of Commerce, and the Institute of American Meat Packers; others are small local associations. Some perform many functions for the industry, covering such matters as research, public relations, cost accounting, product standardization, transportation, insurance, government policy, credit, labor relations, and collecting and distributing statistical information; others do little. Many of these activities are socially beneficial, for they may improve methods and spread knowledge. Some of them, however, encroach upon independent pricing and may become questionable from the standpoint of public policy and of law. These dangers are particularly true of the open-price activities of the associations which were a major feature of the "new competition" stressed by A. J. Eddy of Chicago about 1912. The theory of such activities is that competition will be improved and made more intelligent if everyone in the industry knows the amounts others are producing and selling, at what prices, and under what terms. Unfortunately such open-price reporting to the industry did not always stop there. An energetic secretary or other official of the association might suggest methods of pricing or even try to coerce members into using them for their mutual benefit, and monopolistic price fixing is the result.

Since there is no special statute applying to trade association activities, the courts have had to rule on the legal status of their activities under the antitrust laws. The result has not been wholly satisfactory, since the factual circumstances vary so much from case to case and the economic results of association activities frequently get lost in a myriad of other price-determining forces. The Supreme Court has handed down a number of decisions on the legality of association activities. In 1914 the members of the Eastern States Retail Lumber Dealers' Association, 234 U.S. 600, were prohibited from boycotting wholesale dealers who sold to others than retailers. In the Hardwood Lumber Manufacturers' Association case, 257 U.S. 377 (1921), the first case involving open-price activities, the Supreme Court found the association guilty of eliminating price competition among some of the producers in the industry. Although there was no evidence of a price agreement among them, each producer received statistical information concerning sales, prices, production, stocks on hand, and orders, and association executives exhorted the members to stay in line. This practice, together with a marked rise in the price of the product, convinced the court that competition in production and price had been restricted. In 1923 the court rendered a similar verdict in the case of the Linseed Crushers Council, 262 U.S. 371. This association, in addition to engaging in open-price activities,

had required each member to post a bond to observe his published prices and carry out his responsibilities as a member of the council. The obvious objective of this arrangement was to strengthen the hands of the twelve producers who made up a large segment of the industry. The court found in these cases that even though there were no express agreements covering prices or production, the "necessary tendency" of these arrangements was to impair the effectiveness of competition.

In 1925, in the Maple Flooring Association, 268 U.S. 563, and the Cement Association cases, 268 U.S. 588, the court found open-price activities lawful, presumably on the grounds that the results found in the earlier cases were absent; for example, sharp rises in prices had not taken place in the second set of cases. On the other hand, both the Maple Flooring Association and Cement Association had published information not only on such matters as stocks, prices, and sales, but also on freight rates from certain basing points which are characteristic of delivered systems of pricing. Perhaps the court placed too much emphasis upon the absence of a rise in prices. In any case it found no "necessary tendency" for price fixing to result. Whether it reversed its earlier decisions or found facts sufficiently different to justify different conclusions is still a matter of controversy. In any event the publication of statistical information not accompanied by suggestion or pressure for each member to follow a given price policy would seem to be lawful.

In the Sugar Institute case, 297 U.S. 553 (1936), the court reverted to its earlier position. Suit was brought to dissolve the institute. The decree of the lower court enjoined forty-five specified activities but did not order dissolution. Upon appeal to the Supreme Court, the lower court was upheld in part and reversed in part. The facts were that fifteen members of the institute, representing about 75 per cent of domestic production, had sought after 1927 to eliminate "unfair practices" in the selling of sugar. Secret concessions to large buyers who were thought to misrepresent competitors' prices gave them great advantages at the cost of the industry. To remedy this, a code of fair competition was drawn up to promote open pricing and control credit. Comprehensive statistical information was distrib-

uted to the membership. The most questionable provision of the code was the one requiring each producer to hold to its announced prices. The lower court had attacked this provision, along with the dissemination of information on current and future prices, terms, conditions, and freight rates. Chief Justice Hughes, speaking for the Supreme Court, stated that "the endeavor to put a stop to illicit practices must not itself become illicit," and held that the announcement of future prices was legal, as was the publication of open-price information, but that to try to enforce adherence to announced prices was illegal. Moreover, the court ordered that the purchasers as well as the sellers be given this information. On the whole, this decision reaffirmed the previous position of the court relative to association activities.

Exemptions from the Antitrust Laws.—Numerous exemptions from the antitrust laws have been granted by Congress. Except for temporary exemptions like N.R.A. or war and postwar agreements to aid production or allocate scarce materials, there has been no wholesale suspension of the laws as they affect business. However, particular industries or business practices and the entire field of labor and agriculture have from time to time been made exempt. A few examples will indicate their nature. The exemptions provided by the Clayton Act and the Miller-Tydings Act have already been discussed.

The Webb-Pomerene Act, passed in 1918, recognized the desirability of permitting competing American producers to organize export associations which could compete more successfully in foreign markets with foreign combinations and cartels. However, the act made it unlawful for these associations to restrain commerce within this country or interfere with the export trade of American producers. Thus we permitted combinations to do in foreign trade what could not be done at home, presumably because otherwise we would be at a disadvantage in world markets. Furthermore, foreign buyers were protected by competition from sellers of other nations. A number of these export associations have been organized but, except for a few industries like metals they represent a small percentage of export

trade. These associations have come under criticism in late years for being more interested in price fixing than in exporting, and there is some doubt that combinations in foreign markets are consistent with competition at home. However, no generalization would fit them all. On the whole, they seem to have been less effective than their early advocates, including the Federal Trade Commission and President Wilson, expected.

With the growth of cooperative marketing proposals as a solution to the depressed state of agriculture and despite former exemptions under the Clayton Act, Congress in 1922 passed the Capper-Volstead Act permitting associations of producers of agricultural products. If they raised prices too high, the Secretary of Agriculture was empowered to issue a complaint. This was followed by the Cooperative Marketing Act of 1926, and the Agricultural Marketing Agreement Act of 1937, extending antitrust immunities to the cooperative marketing of agricultural products. The cooperative marketing of fishery products was exempted under the Fisheries Cooperative Marketing Act of 1934.

In the field of transportation, where government regulation has been progressively extended there has been some parallel exemption from the antitrust laws. For some years after 1890 the railroads were subject to the full impact of the Sherman Act as well as the Act to Regulate Commerce (1887) under which federal regulation was begun. Hence there arose a possible contradiction in policy. Railroads were regulated partly because they were monopolistic, yet at the same time, under the antitrust laws they were forced to compete as if they were unregulated. This was of doubtful wisdom and the policy was changed by the Transportation Act of 1920 which permitted railroad consolidation and pooling agreements under control of the Interstate Commerce Commission. The Emergency Transportation Act of 1933, designed to save the railroads from financial failure by eliminating duplication and avoiding waste, encouraged a large measure of cooperation among railroads under the Coordinator of Transportation, with corresponding relief from the antitrust laws. The Motor Carrier Act of 1935 and the Transportation Act of 1940 extended federal control over carriers by highway

and waterway and contained provisions for cooperation and agreement subject to commission control. In 1948, after a long controversy, Congress passed, over President Truman's veto, the Reed-Bulwinkle Bill exempting the railroads from prosecution under the antitrust laws for rate agreements having the approval of the Interstate Commerce Commission. This placed all rate-making activities of the railroads under the continuing supervision of the Commission. The bill had the indorsement of the I.C.C., the Office of Defense Transportation, and other groups. It ended a conflict between the I.C.C. and the Department of Justice over the activities of rate bureaus through which railroads work out rate schedules. It should be noted that the new bill exempts only commission-approved rate agreements. It does not give blanket exemption for other railroad activities.

The field of ocean shipping and insurance is also marked by exemptions from the antitrust laws. Under the Shipping Board Act (1916) pooling and rate agreements of ocean carriers under the United States Shipping Board were permitted. The Mercantile Marine Act (1920) sought to stimulate American writing of marine insurance by exempting combinations of marine insurance companies from the anti-trust laws.

Finally, in the mining of bituminous coal we find an entire industry that was put on its feet by being permitted-even forced—to charge higher than competitive prices. The industry had long been beset by overproduction, severe competition, poor labor conditions, and generally unprofitable operations. Price control began when the N.R.A. code forbade the sale of coal for less than a "fair" market price, but even before May, 1935, the code had become ineffective in preventing price cutting. The United Mine Workers and a few operators sought more effective regulation of their industry and in 1935 the Bituminous Coal Conservation Act was passed, presumably to conserve our almost limitless coal supply. It placed coal prices under the control of a five-man commission from the Department of the Interior. Minimum prices were to be fixed by district price boards, subject to a veto by the Coal Commission. The commission might also fix a maximum price if that were necessary to protect buyers of coal. A punitive tax was levied upon those who departed from the price or labor provisions of the act. In Carter v. Carter Coal Co., 298 U.S. 238 (1936), the act was declared unconstitutional by the Supreme Court, and was succeeded by the Bituminous Coal Act of 1937 which reinstated most of the 1935 act except the labor provisions to which the court had objected. A National Bituminous Coal Commission of seven members was set up. The most important duty of the new commission was to fix minimum or maximum prices of coal. In 1939 this function was transferred to the Interior Department. Minimum prices of coal were to be fixed on the basis of "weighted" average cost for each price area. The law has since expired, but price competition does not seem to have been restored. This is an outstanding example of the exemption of an entire industry from the antitrust laws with little machinery for the effective protection of the consumer. Both the mineworkers and the operators profited greatly by this law, but the consumer, whom competition is supposed to protect, was lost sight of for the most part.

This does not necessarily mean that all results of compulsory mitigation of severe competition are bad; perhaps it is better that mineworkers have much higher wages than other industrial workers and that mineowners be protected in their right to "fair profits." Maybe all this emphasis upon the consumer is misplaced, for in a sense we are all producers as well as consumers. But what about the logic of a free enterprise economy? What about spurs to achievements, to better products, to lower prices, to better use of resources, if price monopolies are permitted? Perhaps we have been wrong about the benefits of competition. Perhaps depressions are aggravated by competition and we ought to permit monopoly to prevent them. Some economists who emphasize the "savings and investment" approach of Lord Keynes are less likely to attack monopoly and stress other solutions for the economic problems that confront our generation. But can they be squared with the fundamentals of a free enterprise society with a minimum of interference by government?

The alternative to a vigorous antimonopoly policy is government regulation in one form or another as a substitute for the forces of competition. Some follow this to the ultimate conclusion that government ownership and operation of the major industries is the solution. Others, objecting to such a degree of state domination, would preserve private ownership and operation, but substitute public regulation for the "regulation" of competition. This "halfway house" appears attractive in these days of the "middle way," and we have tried it in a few industries.

REFERENCES FOR FURTHER READING

- Cherrington, H. V. Business Organization and Finance. (New York: The Ronald Press Co., 1948), Chs. 14-23.
- Curtis, R. E. Trusts and Economic Control. (New York: McGraw-Hill Book Co., Inc., 1931).
- Dykstra, G. O. and L. G. Cases on Government and Business. (Chicago: Callaghan & Co., 1937).
- Handler, Milton. Cases and Other Materials on Trade Regulation. (Chicago: The Foundation Press, Inc., 1937).
- Jones, Eliot. The Trust Problem in the United States. (New York: The Macmillan Co., 1921).
- Keezer, D. M., and May, S. The Public Control of Business. (New York: Harper & Bros., 1930), Chs. 2-4.
- Koontz, H. D. Government Control of Business. (Boston: Houghton Mifflin Co., 1941).
- Lyon, L. S., Watkins, M. W., and Abramson, V. Government and Economic Life. (Washington: The Brookings Institution, 1939), Vol. I, Chs. 10-14.
- Purdy, H. L., Lindahl, M. L., and Carter, W. A. Corporate Concentration and Public Policy. (New York: Prentice-Hall, Inc., 1942).
- Ripley, W. Z. Trusts, Pools and Corporations, rev. ed. (Boston: Ginn & Co., 1916).
- Seager, H. R., and Gulick, C. A., Jr. Trust and Corporation Problems. (New York: Harper & Bros., 1929).
- Watkins, M. W. Industrial Combinations and Public Policy. (Boston: Houghton Mifflin Co., 1927).
- Watkins, M. W. Public Regulation of Competitive Practices in Business Enterprise. (New York: National Industrial Conference Board, Inc., 1940).

Chapter 18

THE REGULATION OF MONOPOLISTIC INDUSTRIES

The aphorism "the grass is always greener in the other fellow's yard" contains much truth when applied to human affairs. We are going to examine the "other fellow's yard" a little more closely to see whether regulated monopoly offers us a better prescription for economic well-being than does competition. course, as we have observed, most of our economic activities are carried on somewhere between the purely competitive and purely monopolistic ends of the spectrum, and so we have various degrees of competition or regulated monopoly. Even in competitive industries, government regulates in a sense by laying down rules under which that competition takes place. Congress passed the Food and Drugs Acts in 1906 to prevent adulteration or misrepresentation of those goods, and has passed other laws affecting other industries, such as the Insecticide Act of 1910, the Seed Act of 1912, the Grain Standards Act of 1916, and the Perishable Commodities Act of 1930. While these acts prohibit certain practices, it can hardly be said that they "regulate" industry. They merely lay down the conditions or "rules of the game" that all competitors must observe. The same is true of zoning laws, building codes, sanitary regulations, and licensing laws. Even where government by means of extensive special legislation and continuing supervision regulates a great many aspects of an industry, as in banking and insurance, we do not find regulated monopoly because private managements are more or less free to determine their own operating policies and charges. and presumably the customer is protected because he can choose from among several firms which are competing for his patronage. Thus, although their range of competition is limited by submission to certain basic legal requirements, we depend upon competition to work its beneficial results in these industries.

One might go even further and say that there are no completely monopolistic industries; even those that are regulated as monopolies must face competition. Railroads, while they are regulated, nevertheless face competition from trucks, buses, the private automobile, waterways, pipe lines, and airways. Among the public utilities, street railways have faced the devastating competition of the private automobile and have lost a long and severe battle for patronage in many cities. The gas company competes with oil, coal, and wood in the sale of either gas or coke for heating and cooking. It competes strongly with electricity for refrigeration. Electricity has no serious competitor for domestic lighting, but for commercial lighting or industrial power it must compete with unit generators and other types of power. Even the water company must recognize that the individual well with an automatic pressure system powered by electricity is an alternative for many of its customers if its charges are too high.

Why then regulate these corporations? The two principal reasons are: (1) the services rendered by these corporations are necessary, if not indispensable, to modern living, and (2) these corporations show a strong tendency toward monopoly and therefore require regulation in the public interest. Of course the "necessitous" nature of the service must not be exaggerated. The production of the basic necessities of life—food, clothing, and shelter—are not public utilities or "affected with a public interest" in the legal sense. Mankind lived for centuries without railroads, electricity, telephones, gas, street railways, or even "city" water; yet today these services are almost indispensable because our living assumes their existence and continuance. Once electricity or a telephone has been installed, great hardship would result from discontinuing the service. If evidence is needed, one need only consult jury awards of damages against public utility companies for cutting off their services. Continuity of service may be even more important to the public than the charges that are made for it; and the law requires such continuity.

There are certain commodities which are also necessary to modern living, and yet companies engaged in these lines are not subject to regulation. For example, the farmer is not required to produce or sell food, nor is the manufacturer, the wholesaler, the retailer, or the restaurant required to supply food to the general public. Why the difference? Mainly because experience has shown that there are enough competitors whose interest it is to provide food, and if one acts arbitrarily or shuts up shop, the consumer will always find another ready to serve him. Thus competitive private enterprise assures that supplies will keep flowing at competitive prices and the consumer, having alternatives, cannot be placed at the mercy of a single producer or group. On the other hand, utility services tend to be rendered under conditions of monopoly; the consumer does not have alternative sources of supply to protect him, and his interests must be protected by regulation.

Causes of Monopoly.—A great deal could be written about the causes of monopoly in the industries that have become classified as public utilities. Common observation explains some of them. Physical factors, such as limitations of space, time, sources of supply, or market areas, sometimes make for monopoly. Our streets just do not have space enough for the physical equipment of several street railway, gas, and electric companies. The topographical configuration of an area may leave few feasible routes for railroads. Service must be rendered within a short period of time in most cases (e.g., street railways, electricity, telephones, water) and the buyer does not have time to shop around for alternative sources. Sometimes nature has furnished only a few good sources of supply (water, natural gas, water power), but even more important are technical, physical, and economic factors which limit the market in which each producer can sell. A power company in the Pacific Northwest cannot sell power to Boston or to Chicago, or even to Denver, if rates are much higher in those cities. Power losses through long-distance transmission are so great as to make it economically, if not physically, impossible. A street railway company can serve only the patrons along its lines; it cannot sell its service in another city. The same is true of steam railroads, gas companies, and telephone companies. Furthermore, in most of these services an expensive service connection (wires, pipes, meters, instruments) virtually precludes access to substitute services. How different from the sale of shoes, where manufacturers can invade each other's markets with ease and sell halfway around the world!

Sometimes the technical nature of the industry makes it desirable for all customers to be served by the same source. For example, all telephone users want to be able to talk with all other telephone users. Street car riders want to go from one point to another, not merely where one company's lines may run. Users of mail service want it to be universal. The movement of freight and passengers by railroad would be made less easy if we had several hundred separate railroads rather than a couple of dozen. Of course, interchange arrangements can be and are made between separate companies performing these services, but these become complicated when carried beyond a reasonable limit. On the other hand, it is a matter of indifference to users of electricity, gas, and water whether their friends or business associates take service from the same concern.

Another explanation of monopoly is to be found in the economic conditions under which public service industries operate. In the first place, these industries require a large initial investment. They cannot start on a shoestring and grow big. They must raise a large amount of capital to begin operations. This in itself is an obstacle to duplication. However, this factor must not be exaggerated. It costs less to install an electric or water system in a small town than to start almost any sizable factory. But it is not the absolute size of the initial investment that counts; rather it is the size in relation to the expected volume of business and expected net earnings. As we have seen in the previous discussion of financial plans, forecasts of gross revenues (sales), costs, and earnings for new public utilities are likely to be more accurate than for most new business enterprises. Furthermore, public service corporations require from four to ten times as large investments per dollar of expected revenue than do most companies engaged in manufacturing or trade; that is, their capital turnover ratio is low. And even if expected profits

are reasonably predictable and stable, it is not uncommon for utilities to endure an early starvation period while construction is being completed and business developed. These early losses are one of the intangible costs of creating the enterprise, and it is always expected that they will be made up in later years. Yet it is not easy to sell new preferred and common stock on which a dividend is uncertain for several years.

In addition, most of the utility investment is in a fixed and specialized physical plant; little is in working capital. That makes the commitment irreversible. It is sunk and can be used only for that single purpose. A change in economic or political conditions can impair part or all of its usefulness as a generator of net earnings—the sole purpose for which it could appeal for the investor's capital. Even if the law permitted (and it does not), the failing utility would find it impractical and unprofitable to scrap its plant, convert it to another use, or move it to another community. Under the best of circumstances a utility earns enough to repay the original investment only over a long period of years; at worst, its liquidation value is likely to be nil. Of course, nonutility plants are also sometimes costly, highly specialized, and of little liquidation value; but frequently there is enough standardization of construction so that the plants can be used by some similar industry. Moreover, investment in nonutility corporations frequently consists in large part of current assets that have high liquidating values, and it is not uncommon for industrial corporations to experience such high sales and earnings relative to the original investment that the fixed plant, or even the entire investment, can be recovered in a few years' operations. At least that possibility can be pointed to by promoters.

Both the law and business prudence require that a utility plant be large enough to care for the present demand for service, with stand-by equipment for emergencies, and to provide for future expansion. This means that there must always be a reserve of unused capacity. Most utility services are not storable. They must be consumed at the moment they are produced, and consumption is anything but stable; it varies with the hours of the day and season of the year, but service must be supplied instantaneously whenever habit or whim moves the user to "press the button." Obviously both the production plant and the distribution plant must provide for a certain amount of excess capacity, the amount depending upon the expected rate of growth, the likelihood of breakdown, and the economies to be achieved from anticipating future requirements. This means that utility plants are built to meet peak loads and since the load curve for all utilities reaches a peak during certain daytime hours, and drops to low levels at night, plant capacity is utilized only part of the time. Weekly, monthly, and yearly load curves also vary. This gives rise to the important problem of off-peak utilization and the problem of pricing policies designed to stimulate off-peak consumption.

The importance of large and expensive plants is further emphasized if we look at the way this factor affects the total cost of performing utility services. Capacity costs, such as depreciation, interest, and property taxes, which vary with the size of the plant, are not only large relative to operating costs, but they are relatively fixed; that is, they do not vary with the rate of output. This results in several cost phenomena. First, it means that the output can be increased without a proportionate increase in total cost. Thus the industry tends to show a low ratio of incremental (marginal) cost to total unit cost, and can usually expand its output within broad limits at a decreasing total unit cost. Second, where the utility produces many services from this common plant, it is almost impossible to determine accurately which services are responsible for plant costs; that is, a large share of the costs of producing each service are joint or common costs with other services and cannot be separated, except by arbitrary methods. Costs thus become an inexact guide to proper rate charges for each service.

These cost characteristics lead to rate policies that help to explain the need for regulation. In the first place, competition tends to become *self-destructive*. Should several utilities or railroads be in direct competition, each one would seek to increase its profits by enticing away its competitors' customers. Since most of its costs have to be met anyway, they would increase very little by serving new customers; hence it would pay

each to get these customers by charging any price that more than covers incremental costs. But the competitor is in the same cost situation. He will meet rate cuts that threaten to take his customers, and perhaps make a raid on his competitor by cutting rates still further. One of two things can happen. Rates may be forced to levels that fail to cover all costs, thus driving one or all into insolvency, or at least seriously impairing the credit and ability of each to render adequate service. It is more likely, however, that the competitors will see the futility of the struggle in which both lose and so will combine or agree on rate charges. In either case, monopoly or a drastic deterioration of the service results. Thus cost conditions are conducive to cut-throat competition and eventual monopoly.

But utility costs are also conducive to discrimination in pricing, a practice that played a major role in bringing about government regulation, particularly of railroads. This practice results where an element of monopoly is present. Under conditions of vigorous competition in all markets, discrimination is less likely to occur. Because the utility operator cannot allocate a large part of his costs to particular units of output, the lowest price he will charge is determined by the low incremental cost. This low rate he may charge where he has to meet competition or where other conditions make demand for the service very elastic. Where he does not have to meet competition or where the demand is relatively inelastic, he will maximize his profit by charging a relatively high price, or even "all that the traffic will bear." In the railroad industry low rates were charged on traffic to competitive points but high rates to noncompetitive points, and low rates (through rebates) to large shippers who could threaten to divert tonnage to competitive roads. The classic case is the old Standard Oil Trust that at one time forced the railroads to grant it rebates not only on its own shipments but upon competitors' shipments as well. Moreover, special rates were granted to particular goods to increase traffic or build up particular industries. The triumvirate—local discrimination, personal discrimination, and commodity discrimination—came to be emphasized as reasons for federal railroad legislation in 1887.

Opportunities for discrimination also arise in other utilities.

It has already been noted that utilities face more competition or demand elasticity in some services than in others. Because of the lack of close substitutes, rates for domestic water service and electricity service for lighting might be high without a drastic reduction in the amount used. But a high rate would bring a sharp reduction in the use of electric power in manufacturing; a high rate for gas would stimulate the use of substitute fuels. Therefore, in the absence of regulation, the low incremental cost widens the discriminatory gap in the rates charged for different services. As we shall see, "differential charging" is not necessarily undesirable, nor is it entirely eliminated by regulation. The main point to note here is that the tendency toward "unreasonable" discrimination was heightened by cost conditions in the public service field, particularly where some services were competitive and some monopolistic.

A final reason for the tendency toward monopoly in the public service industries is to be found in a public policy that recognizes that monopoly is preferable to competition. This policy is expressed by granting a franchise to one company to serve the community and to use public facilities, such as streets.

The advantages of monopoly are said to be numerous. Responsibility for the service and its extension is centered and supported by adequate resources; proper construction can economize space and prevent unsightly conditions; but most of all, the economies of monopoly make possible lower rates to consumers. Costly duplication of facilities is avoided. Economies of one large plant rather than many small ones are usually substantial, both for equipment installations and for current operations. Of course, there are limits to the most efficient size, but they are probably much higher than would be achieved under competitive duplication.

Legal Concept of a Public Utility.—The Fifth Amendment prohibits the government from depriving any person "of life, liberty, or property without due process of law; nor shall private property be taken for public use without just compensation"; and the Fourteenth Amendment limits the powers of the states by the provision "... nor shall any State deprive any

person of life, liberty, or property, without due process of law; nor deny to any person within its jurisdiction the equal protection of the laws." These "due process" and "equal protection" clauses of the Constitution have been the legal bases upon which resistance to government regulation has rested, and the Supreme Court, under the doctrine of judicial review, has been called upon repeatedly to determine the constitutionality of attempted regulation of industries. A long series of decisions on this issue has become a part of our legal heritage.

Only the gist of the decisions as they concern the distinction between industries subject to regulation and other industries will be discussed here.

In Munn v. Illinois, 94 U.S. 113 (1877), the Supreme Court laid down the principle that regulation is permissible in industries "affected with a public interest." The firm of Munn and Scott operated a grain terminal warehouse in Chicago. As a result of the Granger movement, the state of Illinois enacted legislation imposing drastic regulation upon railroads and related services, in particular requiring grain warehouse operators to obtain licenses and post bonds to insure conformity with the law. Munn and Scott refused on the ground, among others, that such regulation, in effect, deprived them of their property without due process of law, and was therefore repugnant to the Fourteenth Amendment. The Supreme Court, in denving this contention, reached back into the common law of England which had for centuries distinguished between "private" and "public" callings, and had permitted regulation of the latter when the public good required it.

What distinguishes a "public" from a "private" industry? Chief Justice Waite, in the Munn case, quoted from a century-old essay by Lord Chief Justice Hale: "Property does become clothed with a public interest when used in a manner to make it of public consequence and affect the community at large. When, therefore, one devotes his property to a use in which the public has an interest, he, in effect, grants to the public an interest in that use and must submit to be controlled by the public for the common good to the extent of the interest he has thus created." Even though it is far from specific, this legal

doctrine clearly established the right of government to regulate. The business of the terminal elevator was found to be "clothed with a public interest" because it stood at the very "gateway of commerce"; in the absence of regulation it might be in a position to exact excessive charges.

But what about other industries? The court had no difficulty in extending the concept to railroads in another of the Granger cases, Piek v. Chicago and Northwestern Railway, 94 U.S. 164 (1877). Common carriers had traditionally been regulated under the common law; railways were in a sense highways, and therefore performing a government function; moreover, they had been given special privileges by the state, such as the right of eminent domain, and were the recipients of public loans and grants of land which were possible only because of their public character. The traditional public utility industries likewise presented no difficulties because the imprint of their public nature was firmly established by franchise grants and the use of the public highways.

When we get beyond the inner circle of these industries, we proceed with less assurance. On the periphery of public utilities have traditionally been some industries that are subject to considerable regulation. For example, commercial banks are organized under special statutes and must observe requirements concerning minimum capital, the accumulation of surplus, minimum reserves, and the quality of investments. They must submit to periodic examinations and review of their policies. Likewise, insurance companies are subject to special regulation, and so are grain exchanges, grain elevators, and stockyards. Even hotels are commonly subject to special requirements, such as the posting of rates for the protection of the public. Yet these industries are not usually subject to the obligations of public utilities which must observe the common law injunction to serve all who apply, to the limit of their ability, at reasonable rates, and without discrimination. In addition, public utilities must assume special liabilities for the safety of persons and property, which they cannot contract away. Can these peripheral industries be subjected to the full responsibilities of public utilities, if Congress or the state legislatures see fit? Here we come to a question of constitutional law to which there is no final answer, although the trend of court opinion has been strongly in the direction of permitting regulation even where the industry cannot be classified as a public utility.

For the great mass of other industries beyond this secondary zone, the legality of special regulation is also uncertain. Of course all industries are subject to the general police powers of the state for the protection of the public health, safety, or morals, and it is often difficult to decide where safety regulation ends and economic regulation begins. Without doubt the state can impose conditions to protect the purity of milk, but can it regulate the price of milk or require the milk dealer or the farmer to serve all who apply, and without discrimination? Similarly, liquor traffic is subject to control, but can the state set maximum or minimum prices at which liquor is sold? At present no one can say for sure.

There was a time, however, when through a succession of Supreme Court decisions a pattern was developing. Not only was the right to regulate railroad and allied industries clearly established in the Granger cases, but that right was extended to other areas, particularly to the usual local public utilities. In 1914 the Supreme Court in German Alliance Insurance Company v. Kansas, 233 U.S. 389 (1914), upheld the regulation of fire insurance companies and their rates by the state of Kansas, even though that business had few earmarks of a public utility, such as the exercise of a government function, a franchise to operate, or the right of eminent domain. It was not a common carrier, its rates had not traditionally been regulated, it had received no grants of funds or lands, and it was not a monopoly. But fire insurance was important to the people of the state and that seemed to convince two-thirds of the court that regulation was legal. Subsequent decisions dealt with attempts to regulate other industries. Federal regulation of transactions on grain exchanges through the use of punitive taxation was struck down by the court in Hill v. Wallace, 259 U.S. 44 (1922), but the defect was remedied in the Grain Futures Act which the court upheld.

In 1923 the court made one of its most significant pronounce-

ments on the subject in Wolff Packing Company v. Court of Industrial Relations of Kansas, 262 U.S. 522. The state of Kansas had sought to protect the public by setting up a Court of Industrial Relations to settle controversies between workers and management. The industrial court was given jurisdiction over disputes in industries affected with a public interest, which the statute defined to include the manufacture of food, clothing, and fuel as well as transportation and public utilities. If it found that the dispute imperiled the health of the people, it could fix wages and other terms of labor contracts which were binding on both sides. Under these powers the industrial court ordered the Wolff Packing Company, a small Kansas corporation employing about 300 workers, to raise wages that the company had previously reduced. The Supreme Court of Kansas upheld the industrial court, but upon appeal the United States Supreme Court held that the act creating the industrial court, so far as it permitted the fixation of wages, violated the "due process" clause of the Fourteenth Amendment.

In a later case affecting the same company the Supreme Court extended the constitutional ban to the fixation of the hours of work as well as wages. What interests us here is the court's attempt to determine whether meat packing was sufficiently "clothed with a public interest" to permit its regulation. Chief Justice Taft, speaking for a unanimous court, said that "freedom is the general rule, and restraint the exception," but regulation may be justified if the business falls into one of three categories: (1) those carried on under a public grant of privileges, such as railroads, other common carriers, and public utilities: (2) occupations long recognized under law as subject to regulation, such as keepers of inns, cabs, and gristmills; (3) businesses, not originally public in nature, which "have come to hold such a peculiar relation to the public that this is superimposed upon them." But such a "peculiar relation" is a question of circumstance and not of declaration by a legislature. There was some question even about the second category, for not all activities once subject to common law regulation can now be regulated. The court said: "It has never been supposed, since the adoption of the Constitution, that the business of the butcher, or the

baker, the tailor, the wood chopper, the mining operator, or the miner was clothed with such a public interest that the price of his product or his wages could be fixed by state regulation."

For the third classification, the key to the public interest "was the indispensable nature of the service and the exorbitant charges and arbitrary control to which the public might be subjected without regulation." And since there were ample supplies of food, including meat, no monopoly in food preparation, and no "peculiar dependence" upon this particular business, the court seemed inclined not to find it "clothed with a public interest," But it did not make a definite ruling on the point. It decided the case against the industrial court on the grounds that the nature of the business (and the small possible harm to the public) was such as to make it unconstitutional to deprive employers and workers of their freedom to hire or not, and work or not at wages mutually agreed upon. Such an abridgment of individual freedom is permissible only where continuity of service is vital to the public welfare, and those engaging in such enterprises have accepted the obligation to serve continuously. [This distinguished meat packing from railroad operations, where the court in Wilson v. New, 243 U.S. 322 (1917), had previously upheld congressional legislation affecting hours of work and wages.] Thus the court did not decide that the preparation of food was or was not affected by the public interest. It only decided that compulsory fixation of wages in such industries went too far.

Subsequent Supreme Court decisions in the 1920's continued to restrict the extension of regulation into new fields of activity. In Tyson v. Banton, 273 U.S. 445 (1927), the court, by a five-to-four decision, annulled a New York law licensing ticket brokers and limiting the resale markup of theater tickets to fifty cents. The amusement industry, said the court, was not a public utility, and it was lacking in those earmarks that distinguished public from private industries. In a vigorous dissenting opinion, Justice Holmes called the notion that a business is clothed with a public interest "a fiction!" and stated that ". . . subject to compensation where compensation is due, the legislature may forbid or restrict any business when it has a sufficient force of

public opinion behind it." This was much more extreme than the dissents of Justices Stone and Sanford who upheld the New York law because it prevented *extortionate markups*, not because all theater business is sufficiently public or monpolistic in nature as to permit a general regulation of its prices by law.

A year later, by a five-to-three decision, the Supreme Court in Rubnik v. McBride, 277 U.S. 350, declared invalid, over a strong dissent by Justices Stone, Brandeis, and Holmes, a New Jersey law regulating employment agencies and their fees, on the ground that they were essentially private businesses. Licensing to prevent extortion or fraud was permissible, but fee fixing was not. In Williams v. Standard Oil Company, 278 U.S. 235 (1929), the same line-up of the court declared unconstitutional an attempt by the legislature of Tennessee to fix gasoline prices. Mere legislative declaration does transform a private industry into a public one, observed the court. The sale of gasoline may be important, but it is no more important than many other unregulated commodities; furthermore, there was no monopoly of sellers of gasoline.

By 1930 the Supreme Court's thinking on the matter seems to have crystallized; the court placed a heavy burden of proof upon those who would extend government regulation of prices and wages to additional industries. In New State Ice Company v. Liebmann, 285 U.S. 262 (1932), the court had occasion to review its position in the light of the severe business depression. The case before it involved the right of the state of Oklahoma to prevent anyone from entering the ice business by refusing to grant a license. Liebmann, who did not have a license, undertook to manufacture and sell ice in Oklahoma City where the New State Ice Company had operated under a license for some years. The company brought suit to enjoin Liebmann but was denied that remedy. The Supreme Court by a six-totwo decision (Justices Brandeis and Stone dissenting) found the ice business to be private in nature, and the disputed legislation to be promotive of monopoly and therefore contrary to the Fourteenth Amendment. In his dissent, Justice Brandeis argued that the manufacture of ice tends to be locally monopolistic, and where competition exists, severely competitive. Competition may be of public disadvantage and legislative bodies should be given the discretion to remedy evils found to exist. He would have thrown out the concept "industry affected with a public interest" as being historically inaccurate. He went even further and, reflecting the depression atmosphere, argued that overabundance and overcapacity could bring misery and unemployment, the remedies for which might be to permit "experimentation . . . to meet changing social and economic needs."

In 1934 the seeds of dissent, perhaps aided by business depression, finally bore fruit. In the Nebbia decision, 291 U.S. 502, which upheld the power of the state of New York to fix the retail price of milk through a Milk Control Board, Justice Roberts, who wrote the opinion, and Chief Justice Hughes lined up with the previous dissenters, Justices Brandeis, Stone, and Cardozo. to make a slim majority over Justices McReynolds, Van Deventer, Sutherland, and Butler. The Milk Control Board had been set up primarily to stop an epidemic of price cutting in the sale of fluid milk, which was obviously to the disadvantage of the farmers and dealers in milk. The board fixed nine cents a quart as the retail store price of fluid milk. Leo Nebbia, a grocer in Rochester, sold two quarts of milk and a loaf of bread for eighteen cents. For this he was fined five dollars and the fine was upheld in the New York courts. Nebbia appealed to the United States Supreme Court.

After pointing out that the milk industry does not have the characteristics of a public utility, Justice Roberts denied that "there is something peculiarly sacrosanct about the price one may charge for what he makes or sells," or that there is a "closed class or category of industries affected with a public interest. . . ." He upheld the regulation of milk prices on the ground that legal controls did not violate due process if they "are seen to have a reasonable relation to a proper legislative purpose, and are neither arbitrary nor discriminatory." The finding that so far as due process was concerned ". . . a state is free to adopt whatever economic policy may reasonably be deemed to promote public welfare . . ." went far to reverse the findings of the court in the Wolff, Tyson, Rubnik, Williams, and New State cases. It is of interest to note that the decision upheld the

legality of minimum prices, thus protecting the producer rather than the consumer.

If the majority opinion is strictly followed, it would seem that the term "industry affected with a public interest" has lost most its meaning. The old Supreme Court majority that clung to it tenaciously has passed from the scene. The present court seems to agree with Justices Holmes and Brandeis that such a separation of industries is a "fiction" and misleading. In recent years the court has gone so far in upholding sweeping regulation of business that the old constitutional landmarks like "industries affected with a public interest" and "interstate commerce" have been all but washed away. Decisions concerning the recovery and reform legislation under the New Deal have upheld federal regulation of prices, production, wages, hours of work, collective bargaining, and security issues in nonutility industries so consistently that it would seem that the extension of government regulation to new industries rests more within the discretion of legislatures than of courts.

Nevertheless, the position of public utilities will remain distinct until either Congress or state legislatures decide to impose regulation with respect to prices, standards of service, and the obligation to serve all without discrimination (and with special liabilities) upon the great mass of private industry, and until the courts have reviewed this position in the light of changed economic, social, and political conditions.

One final legal concept must be considered. It is the requirement that to be classified as a "public utility" there must be a "holding out" or offering to "serve the public." Thus a mining concern furnishing electricity to its own properties is not obliged, as a public utility, to extend its service to others. An individual who supplies his own premises with water obviously does not become a water company. A pipe line does not become a utility if it does not hold itself out to serve the public. A gristmill operated by its owner for his own use is not "affected with a public interest." Motor trucking has introduced some difficult questions. While there was never any doubt that "common carriers" could be regulated, "contract carriers," who did not hold themselves out to serve all, but hauled under special

contracts with a few shippers, were a different matter. The state of Michigan tried to regulate contract carriers by declaring them to be common carriers. The United States Supreme Court held in the Duke case, 266 U.S. 570 (1925) that the state was without the power to impose common carrier duties on all who served for hire. The court also followed this decision in the Frost case, 271 U.S., 583 (1926). However, a Texas law imposing less drastic regulation upon contract carriers than upon common carriers as a means of protecting its highways and regulating traffic was upheld by the Supreme Court in Stephenson v. Binford, 287 U.S. 251 (1932). Extensive regulation of contract carriers by the federal government is provided for in the Motor Carrier Act of 1935.

Methods of Regulation.—The primary purpose of the regulation of public service corporations is to insure adequate, continuous service, at reasonable rates and without discrimination, to all who wish to avail themselves of that service. In the absence of these special obligations the customer would be placed at a disadvantage.

However, for many years no special regulatory machinery was set up. The rights of the customer were enforced through private legal suits. It was through a long history of such litigation that the great body of the common law relative to public industries was developed, and the award of damages to the aggrieved customer who was the victim of inadequate service, unreasonable rates or discriminatory treatment was both a compensation for losses sustained and a warning against a repetition of the practice. This ancient right to sue still exists and is sometimes employed today.

This judicial regulation served in the absence of anything better, but it was inadequate. The courts could not take the initiative, but could act only when a private suit was brought. Moreover, the injured party might not be in a position to sue. The ultimate consumer might bear excessive transportation costs, for example, while the middleman who paid the freight bill and passed it on in the form of higher prices is not concerned. If we add to this a natural tendency of public service corpora-

tions to discourage litigation by making it long and expensive, the infrequency of resort to the courts can be understood. But that is not all. Court action looks to the past rather than to the future. It is remedial of past wrongs rather than prescriptive of a definitive course of action for the future. It can enjoin and award damages for excessive rates, but it cannot prescribe reasonable rates; that is a legislative, not a judicial function. Finally, our courts, handling all kinds of legal controversies—from divorce to mandamus—have little familiarity with the economic or engineering intricacies involved in utility litigation. Some plan for continuous, positive, and expert regulation was needed.

The earliest approach to more complete regulation was through legislation. This sometimes took the form of a statute prescribing general standards, with little detailed specification, and sometimes the form of a special franchise enacted for a particular corporation and applying to it only. General statutes, without implementation, usually did little more than incorporate the broad requirements of the common law that rates must be reasonable, discrimination is unlawful, and so forth. But general statutes, whether enacted by Congress, a state legislature, or a city council are not likely to fit particular practices. Furthermore, legislative enactments are likely to be even more sporadic, less expert, more difficult to achieve, and infinitely more colored by temporary political considerations than is the judicial process. Their one important advantage lies in their capacity to impose binding obligations for the future.

Specific charters or franchises granted to railroad or public

Specific charters or franchises granted to railroad or public utility corporations were employed as devices for regulation. The charter of incorporation might specify conditions of service or even fix maximum rates, as well as permit the corporate body to come into existence and act. This was commonly the case with early railroads, which frequently received charters from several states. Most local public utilities came into existence at later dates, and the common practice was to separate the charter to exist as a corporation from the franchise to carry on operations in a particular locality. The first is now likely to be granted under a general incorporation act (applying to public

utility corporations). The second was originally granted largely by special acts of the state legislatures, but under "home rule" reforms many municipalities have been empowered to grant or withhold franchises. While questionable practices in the granting of local franchises by state legislatures were far too frequent, the transfer of this power to the municipality did not work a miraculous solution. It probably decreased, but did not eliminate, graft and corruption; it made the franchise provisions more responsive to local needs; but even complete honesty, good faith, and regard for the public could not overcome the inflexibility of these contracts between government and the regulated industries. This weakness became clear when changed conditions made some franchises almost unworkable. Even the wisest cannot predict developments very far ahead; yet the duration of franchise grants has to be long enough to attract the needed capital. As time goes on costs may rise or fall, technical conditions may change, and city development may evolve in ways no one can foretell.

Early franchises, reflecting the desire of the people for service and of civic groups for "improvements," turned out to be too generous to some utilities. They were commonly for long terms—ninety-nine years or more—and provisions for such matters as the use of the streets, free services to the city, special taxes, and maximum rates made some franchises very profitable. At first, franchises were not necessarily exclusive; in fact it was expected that the public interest would be better protected by competition than by restrictive franchise provisions. After all, competition had worked well in other industries. Some time elapsed before the competitive analogy was found to be false and monopoly came to be recognized as socially desirable.

Franchise reform was thought at first to be the solution to the problem. Not only did the states delegate their franchise-granting powers to the localities, but the latter were more inclined to be critical, restrictive, and jealous of the public welfare. Perpetual franchises, which were commonly granted in the earlier periods, particularly in eastern cities, became less common. Even long-term franchises that froze the "rules of the game" long after there was need for a change, gave way to

short-term franchises of from twenty to forty years. It was believed than an early termination of contracts would give opportunity to change the rules to fit new conditions, and act as a whip to utilities which had to seek franchise renewal. Unfortunately it did not always work out that way. The short-term franchise discouraged capital investment to extend and improve the service, impeded the sale of new securities, and led to an opportunistic management policy which emphasized the possible salvage and withdrawal of capital at the expense of safety and adequacy of the service. The uncertainty of renewal, the political emotionalism, the necessity to get on with the right people inevitably led the utilities, particularly street railways, into the arena of politics where they could protect their interests. And even then changes might not be "scientific." At best franchises provided little in the way of continuous, expert, and forwardlooking regulation. Moreover, as utilities, through expansion or combination, extended their service to other areas, purely local regulation became inadequate.

The problem of flexibility through contract was met in part by the service-at-cost franchise introduced by the city of Cleveland in 1910 and copied by a number of cities. It applied primarily to street railways which by that time were pinched by the gradually rising prices and costs that set in in 1897. The plan was to make rates rise and fall with costs, with some reserves to prevent continuous rate changes. The city prescribed the standards of service, the items of cost to be covered, the methods of accounting, and reserved the right to terminate the franchise by purchase. Thus the utility had the right to serve for an indefinite period and it was sure of covering costs if patronage remained the same, and of recovering its investment if the franchise was terminated by purchase. Furthermore, provision for continuous supervision by a municipal commissioner improved the regulatory process.

Similar to the service-at-cost franchise, but designed to stimulate voluntary rate reductions by management and spur efficient operation is the so-called *sliding-scale* franchise. Under this type of franchise the corporation is rewarded for reducing the price of the service by being permitted to earn a higher rate of

return on its capital; that is, it profits more by reducing rates. This remedies the tendency toward inefficiency when rates are fixed to cover costs and management is given no incentive to reduce them. The plan was widely used in the gas industry in England (Sheffield adopted it in 1855) and one of its infrequent uses in this country was by the Boston Consolidated Gas Company in 1906. The most conspicuous application of this idea to the electric light and power industry was its incorporation in the "Washington Plan" which was adopted in 1925 after a long controversy between the Potomac Electric Power Company and the Public Utilities Commission of the District of Columbia.

Historically, these franchises have worked successfully only when the price level and costs have been stable or falling. During such periods the utilities may realize a gain that comes from general economic conditions or from technical developments rather than from managerial efficiency. Contrariwise, no matter how efficient management may be, the utilities suffer from inflationary forces that push up prices and costs. Thus, during World War I, complete revisions of the standard rates had to be made. In England, Parliament revised the gas rate structures. In Boston, the Board of Gas and Electric Light Commissioners revised the gas rate upward from 90 cents to \$1.40 by 1921. The Washington Plan has been revised several times. Even in theory sliding-scale franchises leave something to be desired. We have seen that gains and penalties may be quite undeserved; and they usually go to stockholders rather than to the managements which are supposed to be stimulated or penalized. Moreover, they are effective only where rates are relatively simple. Where the rate structure is complex, average revenues rather than standard rates must be used, and these may conceal details deserving the attention of both management and regulatory authorities. Some measure of outside discretion seems to be necessary to make these "automatic" plans work.

The indeterminate permit is a type of franchise that gets away from the defects of both the long-term and short-term franchises. It differs from the perpetual franchise in that it is subject to amendment, revocation, and termination by purchase, thereby avoiding the dangers of granting away rights that are beyond

recall under the "charter is a contract" ruling in the Dartmouth College decision. At the same time it assures the utility of tenure "during good behavior," or, as E. B. Stason suggests, "in the absence of outrageous behavior." The power to amend, revoke for cause, or purchase presumably protects the public, but only if regulation is alert, grounds for revocation are specified, and funds for purchase can be found.

Although revocable franchises have been used in Massachusetts, the District of Columbia, and some of our largest cities, the indeterminate permit received its greatest impetus when Wisconsin introduced it in 1907 and made it compulsory in 1911. Indiana also passed a compulsory law in 1913, and several other states and cities have passed such legislation. But its use is still limited to a few states, partly because it has tended to transfer regulatory authority back toward the state, and partly because the advantages of regulation by state commissions have relegated franchises to secondary places in the regulatory process. Localities cling to control over the local aspects of public utility operations, such as the use of the streets, free services, and special fees, that are embodied in existing franchises. Utilities ordinarily cannot be forced to give up franchise privileges against their will, and public clamor for franchise changes has long since subsided. The indeterminate permit makes it clear that effective regulation must be sought from an outside agency; its use presupposes effective, continuous regulation by an expert commission usually operating on a state-wide basis and having sufficient control over the phases of utility operation to protect the public interest. This includes the power to protect the utility from wasteful competition by forcing potential competitors to obtain certificates of "convenience and necessity."

Regulatory Commissions.—The history of administrative regulatory commissions, established by legislative enactments, is relatively old, dating back to the railroad commissions of the 1830's. But these early commissions had limited powers or were only fact-finding bodies. They had no power to determine

¹ E. B. Stason, "The Indeterminate Permit for Public Utilities," Michigan Law Review, February, 1927, p. 383.

rates, and confined themselves largely to investigating accidents, seeing that charter provisions were lived up to, and making reports and recommendations to the state legislatures.

It was not until after the Civil War and the Granger agitation of the early 1870's that Illinois, Wisconsin, Minnesota, and Iowa enacted laws creating mandatory or strong commissions to regulate railroads whose rates were thought to be excessive and discriminatory, and whose absentee owners were accused of enriching themselves at the expense of the public. The laws placed power over rates in the hands of newly created commissions which could issue binding orders. Railroad combinations were forbidden, as was the issuance of free passes to public officials. The railroads fought this legislation in the courts, and, as we have seen, the United States Supreme Court held (1) that the states had a right to regulate "industries affected with a public interest," (2) that, until Congress acted, state regulation might impinge upon interstate commerce, and (3) that the reasonableness of the rates prescribed could not be challenged in the courts. Even though the second and third points were later substantially modified, these decisions represented a signal victory for regulation by mandatory commissions.

After the Panic of 1873 and a halt in railroad building, there was a general impression, fostered by the railroads themselves, that the restrictive laws were to blame for their distress. All of the states except Illinois repealed or modified their laws and withdrew mandatory powers from the commissions. In later years their powers were restored.

After several congressional investigations, including those by the Windom Committee of the Senate (1874) and the special Cullom Committee (1886), had found that excessive and discriminatory rates and inadequate facilities were outstanding defects of the railroads, Congress tried to agree on a suitable plan for regulation. Passage of the Interstate Commerce Act of 1887 was precipitated by the Supreme Court decision in the Wabash case, 118 U.S. 557 (1886), which held that the state of Illinois could not fix rates on interstate traffic. This reversed part of the Munn decision and threatened to leave interstate rates unregulated.

Under the act of 1887 the Interstate Commerce Commission of five members was created to regulate the interstate operations of railroads and to carry out the provisions of the new law prohibiting "unjust and unreasonable" rates, discrimination between persons, places, and commodities, and making pooling arrangements between carriers unlawful.

In the years that followed, many states created railroad commissions, patterned after the Interstate Commerce Commission. with jurisdiction over the intrastate phases of railroad operation. After 1907 the jurisdiction of some of the state commissions was extended to include some or all of the local public utility services, while a few states at first had separate commissions to regulate railroads and the utilities. In the course of time jurisdiction over all railway and utility industries came to be centered in one commission. Thus Massachusetts, whose Board of Gas Commissioners, created in 1885, was one of the first state commissions with power to fix maximum rates for gas (and electricity in 1887), at one time made street railways subject to its Board of Railroad Commissioners, telephones subject to the Highway Commission, and water companies to the Commissioner of Corporations. With the movement toward the regulation of the local utilities by state commissions that was begun by New York in 1905 and Wisconsin in 1907, there was a tendency toward a single regulatory commission, although New York in 1907 created two commissions, one for metropolitan New York and one for the remainder of the state.

It is natural to ask why the states should have waited twenty years to provide for commission regulation over local utilities. No doubt one reason was that young industries like electricity and telephones were just emerging from their early promotional years. But there were other reasons. Jones and Bigham ² suggest that the lag was caused by (1) the delusion that competition would protect the public, (2) a strong feeling that each municipality should do its own regulating, (3) the opposition of those who advocated municipal ownership as a solution, and (4) the opposition of the utilities themselves, some of which had strong

² Eliot Jones and T. C. Bigham, *Principles of Public Utilities* (New York: The Macmillan Co., 1932), pp. 166-167.

political influence. No doubt all of these reasons were important, but one of the most important was that the advocates of regulation were divided among themselves on the issue of state versus municipal regulation.

At any rate, the movement, once started, gained momentum rapidly. State after state passed legislation patterned on the Wisconsin law, and by 1915 more than half of the states had mandatory commissions. At the present time all states except Delaware have such commissions or a single commissioner. Some commissions control all local utilities, others only a few. Some laws extend the scope of commission regulation to include all important phases of utility operation—rates, service, reports, accounts, competition, and security issues—while others confine supervision to such matters as rates and service only. Commissions are known by different names in different states, "public utility" and "public service" being the most common descriptive titles, although "railroad" and "corporation" are used in isolated instances.

With the widespread criticism of the electric light and power industry after 1929, because of holding company abuses, the failure to reduce rates as other prices fell, and widespread belief that regulation had been a failure, many states amended their regulatory statutes. As an economy measure, the membership of some commissions (e.g., Kansas and Indiana) was reduced, salaries were decreased, and one-man commissions were adopted by Oregon, North Carolina, South Dakota, and Rhode Island. Costs of regulation were more completely shifted to the utilities. In Georgia the entire membership of the commission was thrown out and a new one appointed with instructions to reduce rates. "Public defenders" were provided in many states to plead the cause of towns seeking rate reductions. Supervision over new security issues was adopted by many states. Intercorporate relations dealing with such matters as dividends, upstream loans, and service charges were brought under commission control in some states. Special taxation of utilities was common. There was a wholesale turnover of commission personnel on the grounds that they were "utility-minded." On the whole, this era strengthened regulatory legislation and procedure, but it did little to assure anyone that regulation was or should be free of political influence.

The principle underlying regulation by commission is simple. We have seen that regulation, whether by litigation, direct legislative action, or franchise, was lacking in continuity, objectivity. expertness, and flexibility—qualities that are essential to the solution of the complex problems of public service regulation in a changing economic environment. These qualities were to be furnished by a body of men to whom the legislatures entrusted the administration of the law. Being a creature of the legislature and answerable to it, the commission is bound by the act creating it and by legislation relating to its actions. Ordinarily the state commissions consist of three or more members who serve overlapping terms of about six years. In most states they are appointed by the governor, with the consent of the senate, but in more than a third of the states they are elected by popular vote. Typical salaries are less than \$6,000 a year. In theory, commissioners should be free from political control; in practice, such appointments are frequently political "plums" or are given to those who will carry out the policies of the governor.

The power of a commission to enforce the law is exercised as a unit, although specific duties may be delegated to individual members. The commission acts only after a hearing of all interested parties. It is ordinarily empowered to make rules and regulations that have the force of law, and it is given wide discretion to prescribe rates, standards of service, and methods of keeping accounts and making reports, and to obtain information from utility corporations and their officers and employees. Commission orders are usually binding unless set aside by court order, and utilities are usually specifically accorded the right of appeal to the courts. Most state and federal courts are bound by law to accept commission findings of facts in disputed cases, but there is always a question of where the facts end and the application of the law to the facts begins. One of the safeguards against arbitrary action of a commission is the right to seek judicial review of its orders, and courts have frequently nullified commission orders that were judged to be beyond its statutory authority or in conflict with constitutional ("due process") rights of the corporation.

It is frequently said that the regulatory commission has become a kind of fourth branch of government which combines the functions of the other three. Presumably its functions are primarily administrative in that its main purpose is to administer or execute the law as it is laid down by the legislature. Yet since the legislation is couched in broad and general terms, the commission of necessity exercises a wide range of discretion in issuing orders and making rules. Finally, it holds hearings, passes on evidence, and makes decisions; that is, it acts in a quasi-judicial capacity. Critics of this governmental device have pointed out that the commission is the lawmaker, prosecutor, judge, and jury all rolled into one. Yet it is not directly responsible to the people. No student of government can be oblivious to the dangers of a "bureaucracy" that is not accountable for its actions, yet all the advantages of expert and flexible regulation would be lost if each act had to be monitored by a superior agency of government. There is no inherent reason why the administrative commission should be dictatorial, arbitrary, and irresponsible. If the powers entrusted to it are abused, it should be checked by the legislatures and the courts.

Prices Under Monopoly.—The excursion into the history and machinery of regulation has diverted us from our main point, which is to understand the principles and results of government regulation of monopoly price—both as a matter of social policy and as a major factor affecting corporations in regulated industries.

First, let us see how prices would be fixed by a monopolist who is not regulated. His price will not always be high, for it may pay him to reduce price and increase sales. The price depends upon the elasticity of demand and the cost of producing various amounts of the product. Price will always be set where the quantity sold is such that the additional revenue is equal to the cost of producing the additional goods or service. This maximizes total net profit in the short run. It is well known that

with given cost conditions the monopolist will reap the greatest profit at a price that is higher than marginal cost and higher than the price under pure competition. Thus, less of the product will be sold and at a higher price if the industry is monopolized than if it is perfectly competitive, provided that cost functions are the same in both cases. But we have seen that in monopolistic industries there are economies of operating on a large scale, and costs can be reduced below the level of an "atomized" industry operating under perfect competition. Thus it is entirely possible that a monopolist, in his own interest, will set a price lower than competitive price because he enjoys the economies of production that maximize his profits at a lower price. It may be that such a policy of enlightened self-interest caused one of our most complete industrial monopolies; the Aluminum Company of America, to reduce the price of aluminum over the years, so as to increase its sales and profits. Of course, the fear of possible government intervention or of new competition may have provided some inducement to a low price policy; but it may have been rational action on the basis of prevailing markets and costs. Some observers have maintained that rates would actually be reduced and service improved if utilities were unrestrained by regulation. Since costs do not increase as fast as output, the companies would make more profits by cutting rates and stimulating consumption. Regulation, it is contended, restricts profits and so removes the incentive to expand the sales of the service through rate reductions. It is also frequently argued that railroads should be free to set rates so as to move traffic and meet competition from trucks, waterways, and pipe lines. Here we see that railroads and public utilities are not airtight monopolies but face varying degrees of competition for part of their business. Why not depend upon the profit motive to insure low prices and protect the public?

Of course, the answers are obvious to the student of economics or the observer of business practices. In the first place, only where the demand is highly elastic is a low price policy the most profitable for the monopolist. Where the demand is inelastic, because of the necessity of the service, or the unavailability of substitutes, as in city water or electricity for lighting

homes, the monopolist is in a position to profit by restricting rather than promoting the use of the service. Since most utility services are a necessity to modern urban living and adequate railroad service is essential in this country of great overland disstances and limited alternative means, the profit motive is not sufficient to assure the public of adequate service at reasonable rates under unregulated monopoly.

In the second place, unregulated monopoly may result in unjustly discriminatory price policies because the monopolist has several different markets in which to sell the product or service. Left to his own devices, a monopolist can charge high prices to one customer, or class of customers, and low prices to others. He maximizes his profits when he produces and sells in each market a quantity of product at which the marginal revenue for each market is equal to the marginal cost of producing the entire output. Presumably he could get his maximum profit if he could discover the amount each single buyer would pay rather than go without and charge a price accordingly. Actually, he usually has to deal with whole classes of customers, and this reduces the gains from "dividing up the demand schedule" into its component parts. To customers with high demand prices, inelastic demands, and no available substitutes, he may charge high prices to maximize profits; to those with low demand prices, elastic demands, and many cheap substitutes, he is forced to charge low prices to maximize profits. Hence arises the kind of discrimination that may be more unbearable than a high general level of charges to all users of the service.

Discrimination between large and small users of utility services (between industrial and domestic users of electricity, for instance) may exist because of differences in the nature of demand. In so far as rates are based upon differences in cost or represent an equitable sharing in unassignable overhead costs, they are neither unjust nor uneconomic. In fact, they may represent a price policy that maximizes the use of the service and so helps to keep down the per unit costs of all services. If kept within bounds, a charge in accordance with the intensity of the demand for the service may be highly desirable. Charging all that the traffic will bear is another matter. In the absence of

regulation it is the common result of monopoly pricing, and is socially undesirable in the sense that it restricts the use of the service, results in prices that are out of line with costs, leads to unjust discrimination, and causes a wrong allocation of society's productive resources. At bottom, this is the real reason for government regulation of monopolistic business practices.

It must never be forgotten that the immediate responsibility for determining rates in the light of rational business calculations lies with management. It is good business to fix prices that maximize gains. The function of regulation is not to decide what are the best prices from a business point of view, but only to check rates that are unfair, excessive, or discriminatory. The initiative in rate making is and should be kept in the hands of private management, upon whom we depend for efficiency in operation and businesslike decisions. Until we are ready to socialize our railroads and public utilities (only water supply is now government-owned to a great extent), regulation must leave a large measure of discretion in purely business matters to private management.

In conclusion, it might be noted that good public relations require that utility profits be kept within "reasonable" bounds. In recent years attacks on profits as a share of income have been so continuous and so energetic that its receivers are on the defensive. If, in the public eye, no social sin is greater than making "unreasonable" profits, and little care is taken to distinguish between profits arising from efficiency or a low price policy and those derived from monopolistic practices, public utilities might be well advised to accept profit regulation rather than invite more drastic alternatives.

REFERENCES FOR FURTHER READING

Barnes, I. R. Cases on Public Utility Regulation. (New York: F. S. Crofts & Co., 1938).

Glaeser, M. G. Outlines of Public Utility Economics. (New York: The Macmillan Co., 1927), Chs. 7-13.

Jones, Eliot, and Bigham, T. C. Principles of Public Utilities. (New York: The Macmillan Co., 1932), Chs. 2-4.

Keezer, D. M., and May, S. The Public Control of Business. (New York: Harper & Bros., 1930), Chs. 5-7.

- Koontz, H. D. Government Control of Business. (Boston: Houghton Mifflin Co., 1941), Part III.
- Lyon, L. S., and Others. Government and Economic Life. (Washington: The Brookings Institution, 1940), Vol. II, Ch. 21.
- Mosher, W. E., and Crawford, F. G. Public Utility Regulation. (New York: Harper & Bros., 1933), Ch. 7.
- Thompson, C. W., and Smith, W. R. Public Utility Economics. (New York: McGraw-Hill Book Co., Inc., 1941), Chs. 4-12.
- Troxel, C. E. Economics of Public Utilities. (New York: Rinehart & Co., Inc., 1947), Chs. 1-5.
- Welch, F. X. Cases on Public Utility Regulation. (Washington: Public Utilities Reports, Inc., 1946).
- Wilson, G. L., Herring, J. M., and Eutsler, R. B. Public Utility Regulations. (New York: McGraw-Hill Book Co., Inc., 1938), Chs. 1-3.

Chapter 19

RAILROAD RATE REGULATION

The Problems of Price Regulation.—If we assume that all members of regulatory commissions are enlightened and energetic public servants (and many of them have been) and that they have adequate staffs (which most of them have not had), how should they determine what is a reasonable price or rate? This is the meat of the problem of regulation. The regulation of accounts, reports, mergers, security issues, and dividend policies is commonly undertaken by commissions, but that is all subsidiary to the central problem of insuring adequate service at reasonable rates.

In 1921 Eliot Jones stated the problem of price regulation in its broader aspects.¹ Exploring the wisdom of substituting regulated monopoly for enforced competition as the standard pattern for American industry, he posed most of the following questions. Of course regulated prices should be fair—but fair to whom? To the consumer, the entrepreneur, or the one who works or supplies other factors of production? Is a price that is fair to one, fair to all? In competitive pricing we long ago gave up the medieval notions of "fair price," so well expounded by St. Thomas Aquinas, and substituted the notion that "functional price"—that is, a price which equates supply and demand—is the best guide to economic activity and the most productive of maximum satisfaction for all. But when functional price is not determined under competitive conditions, this concept loses some of its validity and we must substitute some other concept for it.

Should we try to establish by regulation a price that would be the same as competitive price? If so, should we assume that

¹ Eliot Jones, The Trust Problem in the United States (New York: The Macmillan Co., 1921), Ch. 20.

competition will be cut-throat, mild, or cooperative? Moreover, how can we know what price would actually prevail under competition? Will the economists' long-run or short-run competitive models help us, or are these ideas too hypothetical to fit the real world? If we are trying to fix prices where several concerns are involved in the same market, whose price shall we use as a guide? Shall we base prices on cost? If so, whose cost? Or shall we try to segregate markets so that each can charge a price in accord with his cost? If separate costs cannot be ascertained for separate services (as under joint supply), how can cost be used as a guide? How can we decide what it costs to produce gas or coke, or residence and industrial electricity, or a railroad haul of a carload of coal or copper, without making an arbitrary distribution of joint costs?

Other questions also arise. Should prices be permitted to change frequently in response to changes in the prices of raw materials and labor, or should the latter also be regulated? If so, what criteria should be used to fix raw material prices and wages? Should we regulate only the manufacturer or must we also regulate prices at the wholesale and retail level so as to prevent profiteering there? If the latter, must we also regulate the prices of semicompetitive industries which buy their raw materials from monopolies? If regulation is merely directed at limiting profits, how will incentives to efficiency be provided? Will regulation stifle intiative and destroy the one big advantage of private operation? How shall we limit the costs of the bureaucratic army that is needed for enforcement? Who will decide about the quality of the product, and how will public preferences be reflected? If scarcity occurs and prices are not permitted to rise to equate demand and supply, whose wants will be satisfied, and by what process? If by rationing, as in wartime, how great will be the cost of enforcement or the unfairness and degradation of widesperad "black markets"? Is there any way by which selective controls can work successfully, or does effective control in one area inevitably lead to the need for control in bordering areas, in ever-widening circles, until all productive effort is brought into an over-all price and production plan that sounds the death knell of economic freedom? Has our experience in the regulation of railroads and local public utilities been such as to encourage the extension of that particular pattern to other industries?

These fundamental problems of price regulation probe the very depths of our underlying social and economic philosophy. We shall not undertake the gigantic task of answering all the questions, but only of seeing how price regulation has worked in our public service industries. Each one of these industries has its own peculiarities and we must be satisfied with a representative sample rather than a detailed analysis of price regulation in each. Later on it will be helpful to distinguish rate regulation for railroads, which are nation-wide in their operations, competitive in part, and subject largely to federal regulation by the Interstate Commerce Commission, from local utility regulation, where service is extended only to one city area, under conditions of monopoly, and subject to state or local regulation.

However, certain principles are applicable to both railroads and utilities. Regulation of both has been worked out in the same general legal and economic environment; that is, regulatory commissions have had to exercise their powers in a country whose Constitution prevents government from taking property without "due process of law," although in recent years the courts have given government a wide range of discretion in regulation, and government credit has been used to take over public utilities, establish new projects, or encourage other units of government to do so. Regulation takes place in an economic environment consisting in the main of unregulated individual enterprise, and regulatory policies must take unregulated prices into account. Railroads and public utilities must buy their equipment, supplies, and raw materials, hire their labor, procure their managements, raise their capital, and even sell some of their products in the competitive market. Usually commissions have no control over any of these forces and must fit their regulatory policies into the broad pattern of the price structure. If the cost of railroad service goes up because wages have risen, it may mean that rates must be raised. If a dispute over wages or working conditions results in a strike or if the service cannot be expanded because of shortages of steel or equipment, regulatory commissions are helpless to change matters. For with all their grants of authority they cannot control labor or raw material procurement (except perhaps to disallow "excessive" prices of the latter in rate adjustments) or other conditions in the competitive area.

Legal Considerations in Rate Making.—The primary initiative in determining prices in the public service industries lies with private management. Regulation may curb, align, or modify, but the industries are still privately owned and operated for profit; hence the necessity for pricing so as to "market" the service. Historically, regulation was imposed largely to prevent excessive or discriminatory prices, and effective regulation is still thought to be regulation that keeps rates down.

But what is an excessive or unduly discriminatory rate? It is usual for commissions to consider all conditions in arriving at their decisions. This they must do if they are to take intelligent action, but the courts insist upon an investigation of all pertinent facts as part of "due process of law." Rate orders that are arbitrary or capricious will not be upheld in the courts. For economic, legal, and ethical reasons the determination of fair rates involves the consideration of many interests or points of view. On the economic side, regulation must prevent monopolistic exploitation; it must seek to keep rates in line with the "value of the service" to customers so that maximum use will be made of it, but it must also weigh other considerations such as the cost of service. The price must be high enough so that each class of service will pay its own way and all classes of service will yield total revenues large enough to maintain, improve, and expand operations. Where relative rates, as in railroads, affect the ability of areas, centers, or industries to exist, the economic effects of these rates must be carefully considered.

From a legal point of view, the major consideration in fixing all rates or the general level of rates is to see that they are neither unreasonably high and therefore unlawful, nor unreasonably low and therefore confiscatory under the Fifth and Fourteenth Amendments. Most of the legal controversies over regulation have arisen over protests from utilities that commissions have sought to set rates that are too low. At first the courts did not entertain suits to set aside rates fixed by legislative action or commission rulings. In 1876 the Supreme Court upheld the doctrine of legislative supremacy in Munn v. Illinois, 94 U.S. 113: "We know that this is power that may be abused; but that is no argument against its existence. For protection against abuses by legislatures the people must resort to the polls, not to the courts."

Ten years later, in a railroad case, the court modified its position. In Stone v. Farmers Loan and Trust Company, 116 U.S. 331, Chief Justice Waite held that there are limits to the power to regulate. "Under pretense of regulating fares and rates, the state cannot require a railroad corporation to carry persons or property without reward; neither can it do that which in law amounts to a taking of private property for public use without just compensation or without due process of law." In 1890 this doctrine was fastened into judicial tradition by the decision in a Minnesota railroad rate case, 134 U.S. 418, in which the court held that "the question of the reasonableness of a rate of charge for transportation . . . is eminently a question for judicial investigation, requiring due process of law for its determination." But the Supreme Court never laid down a complete set of specifications for a "reasonable" rate. Its task was usually much narrower—to see that under the guise of regulation, confiscation of private property did not result. In 1898, in another railroad case, the court handed down its famous Smyth v. Ames decision, 169 U.S. 466, defining confiscation as fixing rates so low as to fail to yield a "fair return on the fair value of its property." Coming as it did at the beginning of a long upward trend in commodity prices, climaxed by the inflation of World War I, this decision let loose the valuation controversy which has molded the legal character of regulation ever since.

Other legal considerations in regulation may be mentioned. The controversy over whether national, state, or local government should exercise control has sometimes been vigorous, especially under the Constitution which limits the power of the central government to such matters as interstate commerce and reserves all undelegated powers to the states. It is under this

vast reservoir of powers-particularly the "police power"-that states exercise regulatory authority, and they may entrust similar powers to local governments by specific grants. This controversy has been most pointed in the railroad industry. We have seen how the Munn decision was a high-water mark in state control over public service industries (where Congress had not acted) and how the Wabash decision later denied the right of a state to regulate rates on an interstate haul, even if Congress had not acted. The trend toward federal domination of railroad regulation was hastened by Supreme Court decisions in the Minnesota (230 U.S. 352) and Shreveport (234 U.S. 342) rate cases in 1913 and 1914, in which the court held that state regulation might not go so far as to discriminate against or directly burden interstate commerce, if the Interstate Commerce Commission found such discrimination to exist. And in 1922, a unanimous court in the Wisconsin Passenger Fares case, 257 U.S. 563, held that the Interstate Commerce Commission could order an end to a maximum fare of two cents per mile, even if it had been fixed by state statute and even if no direct discrimination against interstate traffic could be proved. The two-cent fare resulted in an "undue" restraint of earning power from intrastate traffic which the federal government, responsible for adequate interstate transportation, had the power to remove.

Similar conflicts have arisen in the interstate flow of natural gas and electricity. The general trend of the decisions has been to deny the states control over wholesale rates for gas and electricity crossing state lines. This principle was firmly cemented when in the Public Utility Act of 1935 Congress vested in the Federal Power Commission the control over gas and electricity transmitted in interstate commerce. It extended that body's jurisdiction to natural gas in 1938.

A final legal factor in the regulation of rates has been the problem of how to make regulation effective where the corporate charter or franchise specifically gives the corporation the right to fix rates. Where the state has reserved the right to amend the charter, there is of course no problem, but where there is no reservation of power the "charter is a contract" rule has to be faced. Where the charter gives the corporation only the right

to fix rates, subsequent regulation to establish reasonable rates has been upheld on the ground that the right to fix rates was always conditioned upon the premise that such rates be reasonable. Unless the charter specifies the particular rate or specifically surrenders the right to regulate, regulation will be upheld. As the court noted in Stone v. Farmers' Loan and Trust Company, 116 U.S. 330, "The right to fix rates has been granted [to the railroad] but the power of declaring what shall be reasonable has not been surrendered." By reason of this principle and the common reservation of the power to amend, franchises and charters have been less of an obstacle to regulation than might be assumed. And it might be added that the rather sweeping grants of authority and "blank check" powers that are vested in regulatory commissions by legislative bodies have seldom been successfully challenged in the courts as unlawful delegations of legislative powers.

Ethical Considerations in Rate Making.—"Fair" is a word that has ethical as well as economic and legal implications. Although commissions usually have sought to make decisions that would be accepted as fair by unbiased observers, some decisions are expedient rather than fair. Thus rural users of electricity may be given the same rate as urban users who usually can be served at less cost, or small users of electricity may be served at a loss because they are poor. Low railroad rates on agricultural products may be thought fair if agriculture is depressed. High railroad rate levels in the Southeast, because of low traffic density, may be reduced under political pressure from southern governors and senators. Charging more for a short haul than for a longer haul over the same line seems unfair on the face of it, but charging the same rate to two destinations which are the same number of miles apart seems fair. It is considered unfair to change rates that built up manufacturing and trade in certain cities no matter how discriminatory or unscientific the original rates may have been; this is one of the reasons why the I.C.C. has never been able to work out a wholly objective or scientific rate structure. Railroad rates are commonly criticized by local interests if they are not low enough so

that everyone can sell in everyone else's market. A rate structure that does not build up its own city is unfair, according to many local Chambers of Commerce.

But not all appeals to "fairness" are unfair in themselves. Suppose a person invested in a public service industry before restrictive regulation reduced its profitability. Would his loss be an unfair one or should he have known better when he invested? Or if he invested money when the law of the land (including Supreme Court decisions) was that a public service corporation was entitled to a fair return upon the present cost of reproducing its property, and subsequently the law was changed (by court decision or otherwise) so that a lower return, based on historical cost, might be used, would it be fair to investors for the commissions to reduce their return or would it be fair to the user of the service if conditions were reversed? Is it fair to deny utilities and railroads rate increases when costs are rising, or deny rate reductions when costs are falling? Are rate reductions to mollify voters fair or only expedient? The list might be elaborated. Fairness must be considered, but it is many-sided. intangible, and sometimes it serves only as a guise for expediency.

Theory of Rate Determination.—In the absence of a competitive market, regulated prices are most likely to square with the requirements of economics, law, and equity if they are based on the cost of performing the service. To the economist, competitive prices benefit society when they coincide with marginal costs in the short run and average total costs in the long run. If regulation attempts to imitate competitive pricing, costs, including a reasonable profit, provide a solid criterion. And even if regulatory authorities do not consciously strive to duplicate the competitive model, they know that rates must yield revenues that cover all costs if the industry is to attract capital, maintain high standards of service, and undertake expansion. Our courts require that rates be set at levels that will cover total costs and avoid confiscation of property, and they have even held that rates for an individual service must cover costs specifically assignable to that service and make some contribution to overhead.

Regulatory statutes sometimes imply that costs are a proper guide for rate making, the most notable instance being the Transportation Act of 1920. Under the "rule of rate making" Congress ordered the I.C.C. to fix rates so that railroads as a whole would earn "a fair return upon the aggregate value of the railroad property" used in transportation. Although the rule was changed in the act of 1933 to the less specific "revenues sufficient to provide such [adequate and efficient] service," cost remains the basic factor in the determination of railroad rate levels.

From an ethical point of view, rates based on cost are generally considered fair, although groups promoting special interests are likely to consider as fair only those rates that serve their purposes.

Costs, then, can be considered the major basis of rate determination. Theoretically, the problem of rate regulation would be greatly simplified if costs could be determined for each service and rates fixed accordingly, but it is not as easy as that in practice. We have seen that many costs-perhaps one-half to three-fourths of all costs—of utility or railroad service are incurred jointly for many services and are not attributable to any single service. How can the large fixed costs of a railroad or utility plant be allocated to individual users of the service? How about such items as executive and office salaries, maintenance expenditures, depreciation, taxes, and the return on invested capital? Only by arbitrary methods can most of these costs be assigned. While accountants sometimes do "divide the indivisible," the result is not by any means an infallible guide to rate making. Some services will not stand rates based upon such cost computations. Suppose, for example, that it is found that the average total cost of electrical service, so computed, is two cents per kilowatt hour. Is it wise to set all rates at that level, even if the entire "industrial" load would be lost because the rate is too high? Or should coal or ore be hauled by a railroad if it does not cover its full share of all costs? The questions seem to be self-answering. It may be better to sell electricity for industrial uses and haul ore at low rates than to forego the business. It may benefit the company as well as those receiving the low-priced service. Even other classes of users are benefited if the low-priced service helps to bear a part of general overhead costs, but not if it does not meet the specific variable costs that it incurs.

In summary, it may be said that cost of service is a valuable guide in rate fixation in the following respects: (1) The general level of rates should cover all costs, including a reasonable return on invested capital, and (2) each service should be charged a rate at least high enough to cover the variable costs incurred. In short, cost sets both minimum and maximum limits for the general rate level, but only a minimum limit for a specific rate.

The other basic factor in rate making is the value of the service. It sometimes is the major factor in fixing the general level of rates, but not often, for it implies that charges would be scaled to the intensity of the demand, which is the essence of unregulated monopoly pricing. Nevertheless, it is both bad business and bad public policy to be blind to what customers will pay for the service. Not that anyone knows the complete "demand schedule" for each service, but because experience shows that revenues fall off when rates are increased. Sometimes the best possible combination of rates and volume of traffic will fall short of covering all costs—as, for example, in many street railway systems after World War I—and it is sheer folly, from any point of view, to raise rates in the hope of covering all costs. By reducing patronage, both the utility and the public are harmed.

Good business judgment should be the best protection against such overpricing, but sometimes regulatory commissions become "market research" men and substitute their judgment for that of management. That has been particularly true of the Interstate Commerce Commission, which even under the 1920 "rule of rate making" ordered railroad rate reductions in 1922, and refused requests for rate increases in the Fifteen Per Cent Case in 1931, when railroads were earning less than a fair return. In 1936 the commission ordered eastern railroads to reduce their passenger fares to two cents a mile in the face of management opposition because it believed that the lower rate would increase passenger revenues. The new "rule of rate mak-

ing" in the act of 1933 specifically states that the commission, in prescribing "just and reasonable rates," shall give due consideration, among other factors, "to the effect of rates on the movement of traffic," thus giving legislative sanction to what had in fact been the practice of the commission.

In nonrailroad utilities, some attention has been given to rates that will stimulate the use of the service. This has been particularly true in the electric light and power industry, where the federal government through its policies of publishing rate comparisons, its encouragement of municipal ownership, and the T.V.A. "yardstick" has stimulated the power companies and state commissions to develop objective or promotional rate structures under which the companies charged low rates on *increased* consumption of electricity. This increased the use of the service and reduced the average cost of electricity without endangering total revenues. Such rate experimentation by management should, of course, be encouraged. It calls for imaginative and public-minded managements, and a flexible rate policy (that "flexes" both ways) on the part of commissions.

The value of service finds its greatest usefulness, however, in fixing particular rates. Under regulated monopoly, this factor provides the primary basis for the distribution of the great bulk, of the unallocated costs, and so supplements cost as a guide in rate making. It provides an element of flexibility that is both desirable and realistic. It keeps the rate structure from being arbitrary and rigid. It permits adjustments that might be impossible on the basis of cost alone. Its greatest drawbacks under regulation are its intangible quality, its tendency toward undesirable discrimination, and its propensity to take rate making too far beyond the stable guideposts of cost.

Railroad Rate Making in Practice.—By exploring the rate systems actually in use by our railroads, both before and after effective regulation, it is possible to grasp the difficulty of fixing each rate so that it is "just and reasonable" beyond question. Illustrations will be drawn from freight rates since they are much more complicated and of greater importance than passenger or other rates, both to the railroads and to the public.

(Over 80 per cent of railway revenues are derived from freight, about 10 per cent from passengers, and the remainder from mail, express, and miscellaneous sources.) We have already noted that, left to themselves, the railroads tended to charge whatever rates they could get. Because of large fixed costs, the inability to allocate costs to specific items of traffic, and the desire of railroads to build up manufacturing, export, trade, or mining centers along their lines, rates exhibited no consistent tendency to conform to any principle except business expediency. Competition of other forms of transportation had to be met, but perhaps the most chaotic results flowed from competition among railroads themselves. Parallel lines, common terminal points, alternative routes, the desire to build up particular ports of export, all stimulated competition at those points to such an extent that traffic sometimes was carried for less than variable costs. Noncompetitive traffic generally bore high rates. Some communities and industries developed because of these rate advantages; those not so favored declined. Strong vested interests fought to preserve their rate advantages. Competitive rate making persisted after 1887, and to save themselves from financial disaster railroads entered into rate agreements or pools which blunted the edge of competition.

Distance rate scales are an interesting illustration. Although one might expect that rates would be roughly proportional to distance, they have not usually been so. In southeastern United States the "distance principle" was of little importance, particularly on freight moved over long distances. Instead, certain cities became "basing points" with low through rates, and the rate to any local point was determined by adding a high local rate to the low through rate to the nearest basing point. These basing points grew up because of their strategic locations on waterways or because they were served by several competitive railroads. This system frequently violated the long- and short-haul principle, where rates were lower to basing points than to intermediate points, although the haul to the basing point was longer. This rate structure has given the I.C.C. many perplexing problems.

In the area between the Mississippi River and the Pacific

Coast (the transcontinental rate area) there was also a major disregard for distance. Because of the alternative water route through the Panama Canal, certain goods susceptible of water transportation (lumber, canned goods, etc.) would move by rail to the area east of Chicago and the Mississippi only at rates that were competitive with water rates. But the railroads faced a dilemma. If they reduced rates to meet water transportation to such ports as San Francisco, Portland, and Seattle, they would have to reduce rates to all points between Chicago and these ports or violate the long- and short-haul principle. If they did this their revenues would suffer. The marginal traffic would set the rates on all traffic. As would be expected, the railroads preferred to compete with water carriers by offering low rates for traffic to competitive points while leaving the rest of their rate structure intact. Serious discrimination against such intermountain points as Denver, Salt Lake City, and Spokane resulted. It cost considerably more to ship goods from Chicago to Denver than to Los Angeles, although Los Angeles traffic went through Denver and continued on for a thousand miles.

However, similar discrimination did not exist on traffic to or from points between the Atlantic seaboard and the Mississippi River. Rates to and from interior cities like Pittsburgh, Buffalo, Cleveland, and Chicago were not higher than those to New York, Boston, Philadelphia or Baltimore; yet water competition was no less a factor. Why? The answer seems to be that the great transcontinental railroad systems, the Union Pacific, Central Pacific, and particularly the Santa Fe, had their eastern terminals in the vicinity of Chicago, whose industries it was to their interest to promote. If lower rates had been granted on traffic to eastern cities, the western railroads' revenues would have been less than if they originated the traffic in the Chicago area and received the entire haul. Competition among western railroads thus forced the rate on traffic to and from Chicago down to the water-competitive rate to Atlantic seaports. Thus a huge blanket area from the Missouri-Mississippi-Chicago line to the Atlantic Coast was created, all cities in the area taking the same rate on westbound, and sometimes on eastbound, traffic. On some hauls, the western edge of the blanket area moved as

far west as Denver, creating a rate zone 2,000 miles in length. Thus in the transcontinental area we find that the result of competitive rate making came to be *local discrimination* and the *blanketing* of rates. The I.C.C. has modified but not completely eliminated rate features of this kind.

A third significant type of rate structure developed in the northeastern or "trunk line" area of the United States. It was adopted in 1876 by railroads competing for traffic between the Atlantic Coast and the Chicago-St. Louis terminals, after they had mauled each other with rate wars which sometimes saw rate cuts of one-half to two-thirds in the course of a few days or weeks. The New York Central, Pennsylvania, and Baltimore and Ohio had reached Chicago by the 1870's, and combinations of short lines with direct or roundabout routes battled for larger shares of the traffic. To prevent further losses from rate wars the railroads in 1876 entered into an agreement which provided for a scale of rates in harmony with the distance principle. The key to this rate system was the New York-Chicago rate, and all rates to intermediate points and their surrounding zones were percentages of this key rate. Thus it was known as the "percentage" system. Percentages were roughly proportional to distance, and rates were determined for zones which were irregular in size because of the desires of large cities and competing railroads to maximize their advantages. By agreement the three major trunk line carriers were also able to work out a system of "port differentials" so that Baltimore (Baltimore and Ohio) and Philadelphia (Pennsylvania) could compete better with New York (New York Central) for export traffic. Differentials of three and two cents below New York were granted to Baltimore and Philadelphia, respectively, on all export traffic. Here we have an example of the way in which a group of railroads, by private agreement, can work out a rate system that removes the most grievous forms of local discrimination, discourages wasteful hauling, maintains some semblance of rate stability and generally recognizes the importance of distance in rate making.2

² For an excellent short account of these major rate systems, see Eliot Jones, *Principles of Railway Transportation* (New York: The Macmillan Co., 1924), Ch. 9.

To complicate the matter of freight rate making still further. we must realize that distance rates, or tariffs, must apply not only to one commodity that might move between more than 30,000 railroad stations in the United States, but to more than 10,000 commodities. To simplify the problem it has long been the practice to classify commodities into a limited number of categories. At first each carrier made its own classification, but uniformity gradually developed and three major classifications came to be adopted. The official classification, adopted in 1887, applies to freight moving east of the Mississippi and north of the Ohio rivers. It divides all commodities into seven classes ranging from 100 per cent down to 27½ per cent of the first-class rate. The Southern classification dates back to 1889 and applies to the area south of the Ohio and east of the Mississippi. It has twelve classes of commodities. The Western classification became effective in 1883 and applies to the entire area west of the Mississippi. It has ten classes. There is no objective way of assigning a commodity to a particular classification, and the same commodity may be classified differently in the three areas because of different cost or demand factors. There has been considerable criticism of the three separate classifications, and since 1939 the Interstate Commerce Commission has moved toward the adoption of a uniform classification that would apply throughout the United States.

Where special conditions require special rates, railroads may depart from the classifications of their territory by publishing "exceptions," or by establishing "commodity" rates, either related or unrelated to class rates. These departures from the regular classifications make up over 90 per cent of total railroad traffic, over four-fifths of which moves under commodity rates.

These thousands of individual charges for hauling different commodities between different points, commonly known as freight tariffs, go to make up the *rate structure*, whose fabric is woven from many individual threads.

Freight Rate Policies of the Interstate Commerce Commission.—Despite the development of more and more complete regulation by the Interstate Commerce Commission, the initia-

tive in rate making and rate changes is taken by the railroads themselves, which usually act collectively through rate bureaus in making hundreds of changes each year. Individual roads may depart from bureau-made rates, but they usually accede. (The legality of such bureaus under the antitrust laws was open to doubt until Congress in 1948 enacted the Reed-Bulwinkle bill granting exemption where the work of the bureaus is subject to the I.C.C.) It must be noted that specific approval from the commission is not needed for each rate change. The commission may hold up a rate change pending investigation or may set aside a rate that is "unjust or unreasonable," but it does not pass upon each change before it becomes effective.

The history of regulation under the Interstate Commerce Commission is too long to detail here, but its philosophy of rate making is fairly clear. By and large it has gradually molded the freight rate structure so that the distance principle is more fully, though not completely, realized. In this way it has eliminated some of the more glaring instances of local discrimination, being particularly severe on long- and short-haul discrimination. prescribing distance scales it has adhered to the fundamental thesis that the cost of performing the service increases with distance and that freight traffic should attempt to meet the test of cost. But the commission has laid down no dogmatic rule, and recognition is given to historical rate factors and the value of service, as well as to cost. The result is the "tapering principle" in which the charge for each successive distance (say 100 miles) becomes less as distance increases, although the total rate increases with the total distance. Over the years, distance scales have been substituted for the earlier rate systems in the Eastern, Southern, and most of the Western rate areas. These scales are higher in some areas than in others: the difference is due largely to differences in costs arising from such factors as traffic density and operating conditions.

Until recently, Eastern class-rate scales were one-third to two-thirds below those of the South and West, but after much local agitation, commission orders (upheld in the courts) have removed some of the discrepancy between areas and eventually may remove all. However, it is to be noted that comparisons of

class rates are likely to be misleading since the great bulk of the traffic moves under "exceptions" and "commodity rates," which have been more fully adapted to the needs of the areas to which they apply. The latter are frequently special point-to-point rates which may not adhere precisely to the distance principle.

Locklin ⁸ sums up the advantages and disadvantages of distance scales as a general principle upon which to solve the intricate problems of railroad rate making by authority. The advantages are:

- 1. They are simple, easily understood, and do not lead to the suspicion of favoritism.
- 2. They conform to the cost-of-service principle.
- 3. They preserve to each locality the advantages of its location.
- 4. They tend to stabilize the rate structure and facilitate business plans for the future.
- 5. They discourage wasteful transportation.
- 6. They promote industrial migration to more favorable locations, which is in the general social interest.

On the other hand, distance scales have certain real disadvantages:

- 1. They limit the ability of producers to sell in distant markets and so restrict competition.
- 2. They perpetuate the disadvantages of location or conditions and antagonize powerful pressure groups in these localities.
- 3. They disregard, in part at least, the value of service which bears no consistent relation to distance.

Perhaps the distance principle is the best way of working out a just, stable, and objective rate structure, but the commission has been realistic enough to know that it does not solve all rate problems.

The Elimination of Discrimination.—The act of 1887 was inspired partly by a strong feeling that all discrimination between shippers was an evil, and Section 2 specifically prohibited it.

⁸ D. P. Locklin, *Economics of Railway Transportation*, 3rd ed. (Chicago: Richard D. Irwin, Inc., 1947), pp. 189-190.

The act was soon amended to prevent rate reductions without notice, to compel reluctant witnesses to testify, and to make shippers and railroad corporations as well as railroad employees liable for discrimination. The Elkins Act of 1903 made departure from a published rate unlawful and generally strengthened enforcement under Section 2. The commission has taken a determined stand against rebating (a practice which has now been largely abandoned) and has waged a continuous war on "smokeless rebates" of all kinds under which railroads favor some shippers by such practices as buying equipment or supplies from them at favorable prices, or by renting equipment from them, or by underclassifying freight hauled for those shippers. The alertness of the commission has largely made personal discrimination a thing of the past.

The struggle to uproot rates that tended to be excessive or discriminatory to localities or classes of traffic was a longer one. Despite the fact that the act of 1887 forbade unreasonable rates (Section 1), unreasonable discrimination (Section 3), and specifically prohibited long- and short-haul discrimination (Section 4) where conditions were "substantially similar," the commission found its early steps contested in the courts. Under the act the commission had to look to the courts to enforce its orders. and would frequently find itself overruled by them because of new evidence concerning the "facts" which the railroads brought to light in extended litigations. In two decisions in 1897, the Supreme Court denied the commission the authority to suppress long- and short-haul violations where competition between railroads created dissimilar "circumstances and conditions": and it forbade the commission to prescribe rates in place of those it had found unlawful, because Congress had not specifically granted the commission that power in the act of 1887. (The Alabama Midland case, 168 U.S. 144. The Cincinnati Freight Bureau case, 167 U.S. 479.)

Congress repaired the damage, but only after the passage of a decade. In 1906 it enacted the Hepburn Act which restored the power to fix maximum rates for the future, and extended commission jurisdiction to sleeping-car companies, express companies, and pipe lines. The act limited the granting of free passes, forbade the carriage of goods (except lumber) produced

by railroad-owned concerns, and tightened up the regulation of reports and accounts. The act added other important implements of regulation. Commission orders were binding (without court order) in thirty days, and the burden of proving them unreasonable in the courts was placed upon the carriers. The Mann-Elkins Act of 1910 further strengthened railroad regulation by authorizing the commission to suspend rate increases for a period of 120 days (plus six months, if necessary) thus preventing new and higher rates from taking effect, if the commission wished to investigate them. The same act restored the power of the commission under Section 4 by requiring specific commission approval of each departure from the long- and shorthaul principle. It also marked the first attempt to set up a separate five-judge Commerce Court with jurisdiction over controversies arising from railroad regulation. After an unfortunate history, the Commerce Court was abolished in 1913.

These two important pieces of legislation did much to give the commission fairly complete powers over railway transportation. But more legislation continued to pour out of the mill as Congress found that new features must be added or old ones changed. One of the bones of contention between the railroads and the L.C.C. was that the latter followed such a restrictive rate policy as to starve them financially. Antirailroad groups retorted that revenues were adequate to maintain the railroads if their property was based on fair value rather than on their inflated capitalizations. To determine the fair value, Congress in 1913 passed the Valuation Act directing the commission to make a valuation of the physical properities of all railroads a task that was not completed until about twenty years later. In 1917 the Esch Car Service Act was passed empowering the commission to make rules for the movement and interchange of cars.

Railroad Regulation After 1920.—With World War I and government operation of the railroads for over two years, it became clear that the adequacy of railroad service was a more important social objective than measures designed solely to keep the rate level from rising. The inadequacy of physical plant and rolling stock, the inability of the companies to mobilize

our railroad resources for a unified effort, the recognition that strong roads could operate profitably on a level of rates that meant starvation for weak roads, and the threat of government operation (directly or under the union-sponsored Plumb plan) forced Congress to consider the railroad problem once again. The result was a blueprint for the future operation of the railroads under private management in the form of the Transportation Act of 1920. Its main provisions follow:

Most important, perhaps, was the enactment of the "rule of rate making" which established the objective of adequate rates. Excessive profits to strong companies (above 6 per cent on fair value of their property) were to be recaptured in part by government for loans to other railroads; and the commission might give weak railroads a larger share of joint rates. To prevent the decimation of revenues by competition, the commission was given the power to fix minimum rates and to fix intrastate rates that discriminated against interstate commerce. Pooling, heretofore prohibited, was permitted under commission supervision. Railroad consolidations and combinations were permitted, with commission approval, according to an over-all plan. The commission was given control over new construction, abandonments, and new security issues. It could order the joint use of railroad terminals.

The only place where its discretion was restricted rather than expanded was in connection with Section 4. In its zeal to protect water transportation and to remove local discrimination, Congress wrote into the law new restrictions, some of which the commission had already voluntarily adopted as a guide to policy: (1) reduced through rates must be reasonably compensatory; (2) they must be made to meet actual, not merely potential, water competition; and (3) the equidistant rule was put into effect but was later repealed. The commission recognized this part as an expression of the intent of Congress that it should deal more strictly with requests for departure from the long- and short-haul principle, and it has acted accordingly.

How well the purpose of Congress has been carried out is a matter of debate. The "rule of rate making" was never fully realized in operation. The commission adopted 534 per cent as

a fair return, yet net operating earnings of railroads as a whole never reached that level until the war prosperity of the early 1942 and 1943 period, and then only temporarily. During the prosperous 1920's, the rate of return exceeded 5 per cent in four of the five years 1925-29. During the decade of the 1930's, the railroads as a whole earned only slightly over 2 per cent on their property investment according to I.C.C. data. This shows clearly that the government did not guarantee a return of 53/4 per cent to the railroads, as it is commonly asserted. But we must not be too hasty in condemning the commission for being unfaithful in its new duties. Earnings cannot be turned off and on, like water in a faucet. Besides, the commission's duty is to protect the public, not the railroads. In 1925 Congress passed the Hoch-Smith Resolution, which virtually ordered the commission to see that rates on agricultural products were kept low. Such are the joys of a regulatory commission, and small wonder it is that the commission, chafing under the "rule of rate making" was happy to see it revised (and the "recapture" clause repealed) in 1933.

Other objectives that looked so promising in 1920 also have been of little significance. Consolidation of railroads, according to the commission's carefully worked out plan to combine weak with strong roads, was unpalatable to the strong roads and, despite much ado, amounted to little. Liberalization of consolidation provisions in the acts of 1933 and 1940 has brought no rush to consolidate. The commission may now approve any consolidation that it finds to be "consistent with the public interest," but restrictive provisions against the displacement of labor inhibit its use as a device to achieve important economies. Only a few pooling arrangements have been worked out. The commission has been reluctant to force the joint use of terminals which would deprive some carriers of their advantages and give others "undeserved" gains.

While the act of 1920 could hardly have anticipated the devastating depression of the 1930's, the inadequacy of even a positive regulatory philosophy was revealed in the persistence of the "railroad problem" which called for several government investigations by special committees of outstanding citizens and for new batches of legislation, including a special amendment to the Bankruptcy Law (Section 77) to speed the financial rehabilitation of the one-third of our railroads that were so unprofitable as to need reorganization.

Other forms of transportation were brought within the jurisdiction of the commission (highway carriers in 1935, water carriers in 1940), leaving only the private automobile and carriers by air beyond its jurisdiction. Lack of space prevents a detailed discussion of the Emergency Transportation Act of 1933, the Motor Carrier Act of 1935, or the Transportation Act of 1940, except as they have been touched upon above. In all of this discussion it must be remembered that, for all its powers, the I.C.C. has no control over the most important item of railway cost—that of labor—nor has it any authority to order a continuation of railroad service in the face of a strike. Labor relations and bargaining over wages now take place under the supervision of the National Mediation Board, set up under the Railway Labor Act of 1926 and having no connection whatever with the I.C.C.

The above résumé presents some of the leading problems and methods of rate regulation in the railroad industry and indicates their changing nature and emphasis. As the result of the development of new forms of transportation, particularly highway transportation, our problem may now be how to deal with a surplus of transport facilities. The watchword then becomes "transport coordination" rather than monopoly regulation, and we ask ourselves new questions: Must we bring all forms of transportation under regulation, or should we relax our regulatory efforts everywhere and permit competition to play a larger part? Should we prevent new competition from coming into the field if such competition is not necessarily any more "wasteful" than duplication in other competitive lines (grocery stores or filling stations)? Can we provide adequate transport facilities if we unduly restrict earnings in periods of business prosperity, when traffic would stand high rates? We know that we cannot, or will not, increase revenues by raising rates in times of business depression. Is regulation, no matter where it starts, always to grow into adjacent areas so that economic freedom becomes more and more restricted? Can government surrender its controls over monopolistic industry when competition appears or must it reach out and regulate the competitor in the interests of coordination? Would our transport industries and the public as a whole be better off if there were more freedom of competition all through the transportation industry, with perhaps a few rules to prevent monopoly?

To date the trend seems to be in the direction of the extension of controls, and I.C.C. policies are now of major importance in transportation by rail, highway, and water. In carrying out its duties it is guided by the National Transportation Policy, laid down by Congress in 1940, to the effect that its objective is to "provide for fair and impartial regulation of all modes of transportation . . . [so as to] promote safe, adequate, economical and efficient service and foster sound economic conditions in transportation among the several carriers; to encourage the establishment and maintenance of reasonable charges for transportation services . . . all to the end of developing, coordinating, and preserving a national transportation system by water, highway and rail. . . ."

REFERENCES FOR FURTHER READING

Daggett, S. Principles of Inland Transportation. Rev. ed. (New York: Harper & Bros., 1934), Chs. 16-24.

Fainsod, M., and Gordon, L. Government and the American Economy. (New York: W. W. Norton & Co., Inc., 1941), Ch. 9.

Johnson, E. R., Huebner, G. G., and Wilson, G. L. Transportation, Economic Principles and Practices. (New York: D. Appleton-Century Co., Inc., 1940), Chs. 11, 17, 19.

Jones, Eliot. Principles of Railway Transportation. (New York: The Macmillan Co., 1924), Chs. 4-16.

Koontz, H. D. Government Control of Business. (Boston: Houghton Mifflin Co., 1941), Part II.

Locklin, D. P. Economics of Transportation. 3rd ed. (Chicago: Richard D. Irwin, Inc., 1947), Chs. 7-22.

Lyon, L. S., and Others. Government and Economic Life. Washington: The Brookings Institution, 1940), Vol. II, Ch. 22.

Miller, S. L. Inland Transportation. (McGraw-Hill Book Co., Inc., 1933), Chs. 20-21, 30-31.

Ripley, W. Z. Railroads: Rates and Regulation. (New York: Longmans, Green & Co., 1912).

Sharfman, I. L. The Interstate Commerce Commission. (New York: Commonwealth Fund, 1936).

Chapter 20

PUBLIC UTILITY RATE REGULATION

Although much of the legal and economic background for the regulation of public utility rates is similar to that of railroads, certain differences are worth noting. Public utilities usually confine their services to a local area; they usually have a monopoly of the particular service; discrimination does not present such grave social and economic implications; franchises have been more important in regulation; and regulation is usually entrusted to state commissions.

Nature of Utility Costs.—In general, local utility rates are much more simple than railroad rates, and "differential pricing" is much less elaborate. At most, separate rate schedules will apply to only a few different classes of customers and the motive for these classifications is to increase the sale of the service. Since a utility plant, with its large fixed costs, usually has some unused capacity, it is good business to increase patronage even if rate concessions are necessary, for the out-of-pocket costs of the extra service are small. (Variable costs make up only about one-third of total costs.) Sometimes the plant capacity exceeds even the "peak load" of the highest hour, day, week, or month of the year. Then special concessions might be profitable even if the peak load is increased, for the capacity is there and its costs continue whether the service is used or not. However, the great bulk of unutilized capacity is due to the lack of evenness in the demand for the service. Plants must be built to accommodate the peak load (with ample stand-by capacity for emergencies) or the "rush hour" because the service must be produced at the instant of demand; it is not storable. The peak load for electricity used for residence lighting comes during the late afternoon and evening of the dark, short winter days; for telephone

service it comes during business hours; for domestic gas it traditionally comes on Thanksgiving Day; for rapid transit it comes in the early morning and late afternoon hours, and so on. During the rest of the time the plant capacity is only partially utilized, and the objective of rate making is to build up off-peak utilization so that the ratio of average use to peak use (the "load factor") or average use to capacity ("capacity factor") increases. This not only tends to maximize profit for the firm, but it increases the use of the service by the community. In the absence of regulation, of course, the pricing of each service according to the intensity of the demand for it may lead to excessive rates or to unreasonable discrimination, and the function of regulation is to keep these two tendencies under control.

The objectives of rate regulation, then, are to prevent excessive monopoly prices and unreasonable discrimination, and to increase the use of the service. Here again we must distinguish between the general level of rates and the rates for particular services. The objective in determining the general level of rates is to see that total revenues derived from the sale of all services are no more than adequate to insure continuation of operation, prevent unlawful confiscation of the utility's property (under the "due process" clauses), and be considered "fair and equitable" to all concerned. The objective in fixing rates for specific classes of customers is to see that they are fair and nondiscriminatory.

Cost Allocation and Rates.—For several decades there has been a strong tendency to emphasize the need for "scientific" rate schedules. Rates, like Topsy, in the early years just "grew up" with little attempt at promotion through differentiation. As the more progressive managements saw ways of tapping new off-peak markets by rate concessions, efforts were made to "merchandise" the service. In electricity that meant new low rates for such uses as industrial power, cooking, water heating, ice making, battery charging, and industrial processing in the place of one rate for residence use, one for commercial lighting, and perhaps one for street lighting.

The "scientific" rates usually were based on the assumption

that each rate schedule is valid if each user bears his share of the total costs. This is where the puzzle begins. For what is the proper share of each? The answer for electricity is usually to divide costs into three classes: (1) those which vary with the number of customers (customer cost), such as service connection, meter, meter reading, billing, and keeping records; (2) those which vary with the responsibility for plant capacity or the rate of maximum demand that can be placed upon the plant (demand cost), such as maintenance, depreciation, property taxes, and cost of capital; and (3) those which vary with the actual output of the service (output or energy cost), such as fuel, variable labor, and supplies and repairs that vary with the rate of use. Obviously some costs, such as executive salaries, cannot be assigned to any of these three categories with precision and some measure of discretion must be allowed.

The application of these costs to rate schedules is largely a matter of arithmetic, tempered by experience and judgment. For example, it is usually estimated that total costs of electricity service are divided about as follows: customer costs, 15 per cent; demand costs, 40 per cent; and output costs, 45 per cent. Each one of these classes of costs is then divided among the customers on the appropriate basis. Customer costs are divided by the number of customers to derive the cost attributable to each. Demand costs are divided by the maximum load (in kilowatts) placed on the plant at any one time, and are allocated among the different users in proportion to the capacity of all their lights and appliances (connected load), corrected for the fact that all appliances are not in use simultaneously (demand factor) and that not everyone in any class of customers uses his maximum amount of service at the same time (diversity factor). Thus the plant need not be large enough to meet the combined potential demands of all users at any one moment of time. Finally, output costs can be allocated among the users on the basis of the energy actually used, as recorded by a meter.

The biggest defect in this kind of cost allocation is the difficulty of assigning capacity, or demand, costs, particularly among domestic and small commercial users of electricity. Because meters which measure the maximum rate and time of usage are too expensive to install, they are feasible only for large users. For domestic users, rules of thumb are usually resorted to, such as measuring maximum demand by the number of outlets, the amount of floor space, or the number of "active rooms." These may have been usable indicators when electric lighting was the principal use, but now a small home with an electric stove and refrigerator may place a larger demand on the plant than a larger home without them.

An additional serious problem is trying to place responsibility for the peak load, which determines the size of the plant. When lighting was the only important service there was no question, but the expanded use of electricity in industry might shift the responsibility for the peak load in many communities. Should all capacity charges therefore be shifted in industry? If so, will industry stand it or sharply curtail its use of the service? Or, for that matter, should a greater part of capacity costs be shifted to customers who have electric stoves, refrigerators, and television sets (which can be used at peak hours), or must we disregard these appliances in our demand calculations because they are good "load builders" at off-peak hours and would be priced out of the market if we treated them in the same way as electric lighting? Some services, such as water heating, ice making, and battery charging, can be controlled and confined to off-peak hours, but not others. Has not the "scientific" allocation of demand charges broken down because of new uses of electricity, promotional pricing, load building, and the difficulty of assigning joint costs-to say nothing of the difficulty of measuring the maximum demand of each customer? Possibly so, but the ideal still has merit. In so far as capacity costs can be definitely traced to particular users of the service, they should be borne by them, for one of the basic principles of equitable and economic pricing is that no user or class of users should be saddled with the cost incurred specifically by another user or class, unless there is some strong reason of public policy why one class should subsidize another.

In actual rate practice, scientific accuracy is only approached. Many costs are jointly incurred and would not cease if any one customer or class dropped out. These can be distributed in only one way—according to the intensity of demand or the ability of the service to bear it. Each service should bear the costs (customer, demand, and energy) specifically attributable to it and make some contribution to joint costs.

But other forces enter to make rate determination under regulation something less than scientific and objective. The first is inertia. Radical changes even of unsound rate structures are seldom initiated by utilities or demanded by commissions, both of which have a tendency to "let sleeping dogs lie." The second is public opinion. Through ignorance, distrust, or political agitation complicated rate structures are subject to suspicion. People usually think of buying electricity like loaves of bread—you should pay for what you get—and suspect that there is something wrong if their monthly bill for electricity contains a special "demand charge" of any kind. Small users (frequently served at a loss) would protest against a fixed monthly charge that covered the costs of serving them. When utility rates become a political issue, rate structures that arouse public opposition must be avoided, if possible.

Types of Rate Structures.—A complete catalog of the different kinds of rate structures in use is not necessary here, but a few leading types might be mentioned. The oldest and simplest is a uniform charge to each user of the service. This is known as a flat rate, and is sometimes used by water companies. It has the virtue of allocating customer costs properly and maximizing the use of the service, but it has no accurate relation to demand costs and none whatever to output costs. It encourages waste and so is seldom used. The fixture rate is a kind of flat rate based on the number of outlets on the users' premises. It correlates reasonably well with customer and demand costs and increases consumption, but it disregards output costs and leads to waste. It is little used.

Meter rates, which base charges on the amount of the service used, are the most commonly employed. The simplest form is the straight meter rate which makes a charge (like four cents a kilowatt hour) for each unit of service regardless of the amount used. It covers output costs well, but may fail completely to

cover customer and demand costs if usage is small. If no service is used in a given month, for example, nothing is paid. It also has the defect of overcharging the large user who should receive the benefit of lower charges because of reduced unit costs as consumption is increased; and by keeping the charge high when variable cost is low it discourages extensive utilization. Recognition is given to lower costs per unit of service as consumption increases by the step meter rate, whereby those using a small amount pay one rate while those using larger amounts pay lower rates per kilowatt hour of consumption. This eliminates some of the defects of the straight meter rate but brings some of its own, principally that it pays to waste the service as the rate limits are reached. Thus it costs only \$3.50 to use 50 kilowatt hours a month at seven cents while to use 45 kilowatt hours a month at eight cents would cost \$3.60. By wasting 5 kilowatt hours the user can actually reduce his monthly bill. This rate also has the defect of all meter rates, namely, that customer costs and demand costs are not met directly but are hidden in the higher charges for energy. As such they are not covered unless there is considerable use of the service. The step meter rate is used only rarely.

The most common form of meter rate is the block meter rate in which higher charges are made per unit for consumption in the first block, and the charge decreases per unit in succeeding blocks as consumption increases. However, the charge for service in each block is added to the charge in the preceding blocks, so the charge for larger consumption can never be less than for smaller consumption, and there is no inducement to waste. Moreover, the high rates in the initial blocks are designed to cover customer and demand costs and permit the user to obtain additional service at rates that cover only output, or energy costs. This stimulates use of the service. It thus makes each customer's bill correspond in a measure with the costs the company incurs in serving him. But two important exceptions must be noted. First, if his consumption is small he may not cover these fixed costs in full. This defect is commonly remedied by making a minimum charge (commonly fifty to seventy-five cents a month) for which that much electricity may be used, or a "special" or "stand-by" charge which must be paid each month and does not include any electricity. Second, like all meter rates, charges are the same for the same consumption regardless of differences in demand. Capacity costs are obviously lower for the user who utilizes a demand of 2 kilowatts for 10 hours a day than the user who utilizes a demand of 20 kilowatts for 1 hour a day, yet both would use 20 kilowatt hours a day and pay the same charges.

To remove the last defect, one type of rate (the Wright rate) varies the size of the blocks with the size of the maximum demand. Thus the rate is stated in terms such as "the first 10 hours' use of active demand at 8 cents," "the next 20 hours of active demand at 6 cents," and so on. Thus the user with an active demand of 1 kilowatt would pay 8 cents per kilowatt hour for the first 10 kilowatt hours, while the user with 5 kilowatts of active demand would pay the 8 cent rate for the first 50 kilowatt hours. Of course, a minimum or fixed charge would have to be made to insure that all users would pay at least part of the customer and demand charges. Although the Wright rate has been used in a number of our larger cities, it has not had wide adoption. The difficulty and cost of accurately measuring maximum demand and the arbitrary nature of the "active room" substitute basis make its application something less than accurate. Moreover, the rate is complicated and invites public distrust and criticism. Hence it is usual now to use the simple block rate with a minimum charge, even though it is obviously less accurate.

In one type of rate, an out-and-out demand charge is made on the basis of the maximum demand per month as measured by a demand meter. In addition, there is an energy charge which starts relatively low because the bulk of customer and demand charges have been separately covered. This two-part rate—usually known as the Hopkinson rate—is commonly employed for large commercial and industrial concerns whose use is so large that a maximum demand meter can be installed, and who understand the nature of the rate. A three-part (Doherty) rate is much like the Hopkinson except that the customer and demand charges are separated in the rate schedule. Although each has something to commend it, general public acceptance is lacking.

Until it is "sold" and until there is a more feasible and accurate way to measure maximum demand it will be of negligible importance in the domestic field.

Level of Rates.—Public utilities, like railroads, are regulated to insure adequate service at reasonable rates, but if such regulation is to be successful it must not be merely negative. "Reasonable" rates are not always the lowest rates that can be forced down the throats of regulated industries. The need for adequate revenues has its economic, legal, and ethical sides, as we have seen; but legal controversies over the adequacy of the revenues to be derived from the regulated rate structures have been important in the history of local utility regulation, particularly since World War I. The legal principles apply also to railroads or any other industry subject to price regulation.

After the Supreme Court came around to the view that regulation must not be so oppressive as to result in the deprivation of fundamental constitutional rights, particularly in the confiscation of private property, it attempted in Smyth v. Ames, 169 U.S. 466 (1898), to define confiscation in terms of the failure of a regulated industry to receive a "fair return on the fair value of the property." Obviously this is a net return—after all operating expenses and taxes have been deducted. The net earnings must be large enough to constitute a "fair return" on a "fair value," if confiscation through regulation is to be avoided, but how do we measure these two concepts?

Net earnings derived from the service are determined largely by the application of standard accounting procedures and represent essentially what is left after all expenses, including reasonable provisions for depreciation and taxes (but before interest and dividends), have been met. Ordinarily the courts have not permitted commissions to interfere with or control the expenses of operation. They have usually allowed depreciation and taxes, and even payments to affiliated companies for rented equipment and management services, as legitimate expenses. However, since the Supreme Court in *Lindheimer v. Illinois Bell Telephone Company*, 292 U.S. 151 (1934), upheld the Illinois Commission in a rate reduction order which questioned depreciation

allowances and parent company service charges, there has been less reluctance to consider operating expenses as being wholly within the province of management. The legitimacy of operating expenses may be one factor in testing confiscation.

The Valuation Controversy.—The Supreme Court has not to this day defined "fair return" or "fair value" with precision. In Smyth v. Ames, 169 U.S. 466 (1898), it ventured to suggest that several factors (some of which are obviously irrelevant) must be considered: ". . . the original cost of construction, the amount expended in permanent improvements, the amount and market value of its bonds and stock, the present as compared with the original cost of construction, the probable earning capacity . . . and the sum required to meet operating expenses. . . ." It is clear that the court did not mean "value" in the ordinary economic sense, for the market value of a utility or railroad corporation depends largely upon the capitalization of its earnings, and high earnings would therefore mean high value. But the reasonableness of the earnings has been the central question, and earnings cannot be judged by the value which they determine. Similarly the market values of stocks and bonds depend largely on earning power and are therefore a defective measure of "fair value" for regulatory purposes, as the court itself had previously pointed out.

As other evidences of "fair value" were found defective, the cost of the property came to be stressed as an evidence of value. But the reversal of the downward trend of commodity prices in 1898 made more poignant the question of whether original cost or present reproduction cost was the best evidence of value. Before Smyth v. Ames, the regulated industries (largely railroads) had contended for original cost since prices were falling, and the government held that the regulated corporations were entitled to no more than a return on what it would cost to reproduce the property at the time of the controversy. After 1898 the two sides traded positions. The Supreme Court first took cognizance of the issue in 1909, when in the first Consolidated Gas Company case, 212 U.S. 19, it upheld a maximum gas rate of 80 cents per thousand cubic feet for New York City, as fixed by

an act of the state legislature. However, after noting that value is to some extent based upon opinion, a unanimous court had occasion to remark that "if the property, which legally enters into the consideration of the question of rates, has increased in value since it was acquired, the company is entitled to the benefit of such increase." In 1913, in the Minnesota Rate cases, 230 U.S. 352, the court, in applying the "fair value" rule to maximum intrastate railroad rates fixed by the state of Minnesota. held that the present value of property may be more (or less) than cost. "It is that property, and not the original cost of it, of which the owner may not be deprived without due process of law." It found that "when reasonably applied" the "cost of reproduction method is of service in ascertaining the present value of the plant." However, it disapproved of estimates of reproduction cost based upon "mere conjecture" or speculation, and held that the determination of value "is not a matter of formulas" but of "reasonable judgment."

With the inflation of commodity prices that attended World War I and its aftermath, the valuation kettle began to boil. In a rapid succession of cases the majority of the Supreme Court, while still avoiding a definite formula for valuation, veered strongly toward reproduction cost as the proper basis, while Iustices Brandeis and Holmes dissented, and argued for "prudent investment." In the celebrated Southwestern Bell Telephone case, 262 U.S. 276 (1923), the Supreme Court set aside a rate order of the Missouri Commission, the majority holding that the commission had erred in failing to consider the current high costs of labor and materials. It even suggested that "an honest and intelligent forecast of future values . . . is essential." In his classic dissent, Justice Brandeis agreed that the rate order was confiscatory, but on the ground that it allowed an inadequate return on the amount that had been prudently invested in the property. He believed the rule of Smyth v. Ames to be "legally and economically unsound." It is interesting to note that the court ordered a rate base only 25 per cent higher than that found by the commission, even though the costs of labor and materials had risen considerably more than that.

A few weeks later in Georgia Railway and Power Company

v. Railroad Commission, 262 U.S. 625 (1923), the Supreme Court seemed to depart drastically from the reproduction cost principle by upholding a rate order in which the Georgia commission had considered but given little or no weight to the cost of replacing the property. Significantly Justice Brandeis wrote the opinion for the majority, from which only Justice McKenna dissented. In another decision, handed down on the same day, the court held that the Commission of West Virginia had erred in fixing water rates for the Bluefield Water Works largely on the basis of historical cost and without giving sufficient weight to 1920 prices (262 U.S. 679). Justice Butler speaking for a unanimous court said: "Rates which are not sufficient to vield a reasonable return on the value of the property used, at the time it is being used to render the service, are unjust, unreasonable, and confiscatory. . . ." And "value" in this case apparently meant giving weight to 1920 prices. The two decisions obviously can be reconciled only by the superficial difference that in the first case the commission "considered" (but attached little importance to) reproduction cost, while in the second case it refused to do so. Apparently the court was still far from any definite notion of what constituted fair value.

In 1926, in McCardle v. Indianapolis Water Company, 272 U.S. 400, the court not only re-emphasized the importance of reproduction cost but it upset the use of ten-year average prices by the Indiana commission as a measure of reproduction cost on January 1, 1924. The majority opinion (from which Justices Brandeis, Holmes, and Stone dissented) argued for the use of prices at or near the date of the rate order, and was commonly construed as requiring the use of "spot" reproduction cost. Three years later an I.C.C. order recapturing the excess earnings of the St. Louis and O'Fallon Railway (under the recapture clause of the act of 1920) was reversed when the Supreme Court found that the commission's method of valuation gave insufficient consideration to reproduction cost.

The above decisions marked the peak of the reproduction cost philosophy. Whether it was due to the ensuing depression, or to the widespread hostility toward utilities, or the fear that "spot" reproduction cost might work a hardship on those utili-

ties whose plants had been constructed at the higher level of costs that prevailed in the decade of the 1920's, or perhaps because facts were different, or the emphasis was different, a retreat from the most extreme positions was evident in valuation decisions after 1932.

In 1933, the previous dissenters found themselves with the majority, and Justices Butler and Sutherland, who had written several of the valuation decisions during the previous ten years, made up a new minority when the Supreme Court handed down its decision in the Los Angeles Gas and Electric Corporation case, 289 U.S. 287. A rate-reduction order in 1930 by the California commission was upheld against the protests of the company. Asserting that the making of rates is a legislative function to be interfered with by the courts only when "confiscation is clearly established," the court reiterated its earlier opinion that fair value "is not a matter of formulas" but of reasonable judgment, based on "all relevant facts." This was taken as new evidence of reluctance on the part of the court to interfere with commission orders, and of an increasing tendency to recognize historical cost as a measure of fair value, for the California commission had leaned heavily on that measure. On the other hand, many observers saw little that was new or novel in the decision: two-thirds of the plant had been constructed after 1923 and the trend of costs was downward at the date of valuation, and therefore historical cost was an ample measure of reproduction costs. (The trend of prices was again a significant factor.) Even the failure to include some items (e.g., going-concern value) might be permissible if the inclusion of other items (e.g., obsolete plant) offset it, according to the decision.

But the court was not willing to follow reproduction cost to its logical conclusion either. In 1933 the Maryland commission tried to force down telephone rates, using sixteen different price series to show that the trend of costs of reproducing telephone plant and equipment was downward. Applying such index numbers to the predepression value of the plant, it found a substantially lower value at the end of 1932. The attack on the rate reduction order was carried to the Supreme Court, and in the Chesapeake and Potomac Telephone Company case, 295 U.S.

662 (1935), the court held that valuation by the use of index numbers is inaccurate, subject to abrupt changes, and incomplete since it neglects "other relevant factors" in valuation. Thus at least one fairly simple and inexpensive way of bringing reproduction cost down to the date was ruled out. Justices Stone, Brandeis, and Cardozo dissented with vigor.

With an influx of new members after 1937, the tenor of Supreme Court decisions veered sharply away from the reproduction cost basis, if not from the entire rule of Smyth v. Ames. In the Natural Gas Pipeline case, 315 U.S. 575 (1942), a unanimous court sustained a rate reduction order of the Federal Power Commission against two natural gas transmission companies. The words of Chief Justice Stone reiterated the traditional denial that the Constitution required rate making "by any single formula or combination of formulas." He continued. "Once a fair hearing has been given, proper findings made, and other statutory requirements satisfied, the courts cannot intervene in the absence of a clear showing that the limits of due process have been overstepped." The courts can intervene only where the acts of the regulatory agency are arbitrary. Justices Black, Douglas, and Murphy asserted that the court should have gone further "to lay the ghost of Smyth v. Ames which has haunted utility regulation since 1898."

Any doubt that the new court had freed regulatory commissions from their obligation to consider reproduction cost was dispelled two years later when in the Hope Natural Gas Company case, 320 U.S. 591, a rate order of the Federal Power Commission based upon original cost was upheld in a five-to-three decision. The majority, speaking through Justice Douglas, held that rate orders were to be judged by the results reached, not by the methods employed. "It is not the theory but the impact of the rate order which counts. If the total effect of the rate order cannot be unjust and unreasonable, judicial inquiry under the act is at an end." Justices Frankfurter, Jackson, and Reed dissented, and Justice Roberts did not participate in the decision.

It now appears definitely established that regulatory commissions are to be given much greater latitude as long as the over-all result is "just and reasonable." They are free to use "prudent investment" or any other rate base that will yield such a result. It is obvious that "just and reasonable" has become the intangible, indefinable sort of standard that existed before the court breathed content into it and started the valuation controversy. And one might wonder if half a century of controversy had been futile.

Would it be "just and reasonable" to disregard reproduction cost if inflation multiplied the price level ten times, or to disregard even prudent investment in favor of another criterion that a commission might deem "just"? The court might some day have occasion to answer any number of hypothetical questions. To date it seems to have hewed to the line laid down in the gas company decisions. And while it has not completely buried the valuation controversy that threatened to stifle effective regulation, it has reduced it to manageable proportions by eliminating the continuing necessity to revalue property and to engage in much idle speculation about the different elements of value, such as franchise value, going-concern value, good will, and other intangibles.

Prudent Investment vs. Reproduction Cost.—Whatever may be the merits or demerits of "prudent investment," at least it is conducive to effective regulation. It is definite; it can be kept up to date by proper accounting methods; it protects the capital actually committed to the public service; it impresses the user as being fair since he pays no "phantom cost"; it contributes to the stability of revenues and earnings, and prevents the wide fluctuations in earnings from which only the common stockholders (who put up about one-fourth of the capital) can benefit, but from which all security holders might suffer. Furthermore, its use may dampen the enthusiasm for public ownership by convincing users that they are paying only the actual cost of the service and by making regulation prompt and effective.

On the other hand, reproduction cost is not entirely without merit on economic grounds. If regulated rates are to move with prices in general—instead of counter to other prices—reproduction cost would seem to be an appropriate rate base. Of course, with either original or reproduction cost, rates tend to rise when prices of labor and materials rise because of an increase in operating costs which usually make up from 60 to 80 per cent of all costs. Valuation would affect only the remainder. Yet economic adjustments and public relations might be improved if utility prices were free to move in harmony with other prices. Certainly high rates in depression and low rates in prosperity do not make sense from the standpoints of public opinion, the best utilization of economic resources, or economic stability.

Similarly it may be argued that reproduction cost gives a closer approximation to competitive pricing, under which prices of goods (and services) tend to equal the cost of reproducing them, not their historical cost. Advocates of "prudent investment" answer that prices should be fair rather than what they might be in competitive industry, since regulation is necessitated by the failure of competition to protect the public. Moreover, if the analogy to competitive price is the criterion, it is not the cost of reproducing the identical plant but of reproducing the service, with new and better equipment, that is correct. Shall we therefore add speculation to conjecture by trying to determine the cost of the service from an imaginary plant?

Furthermore, as a matter of justice, are not investors entitled to protect their real incomes against a drop in the value of the dollar? In the competitive world that surrounds the regulated island they may gain from rising commodity prices. Why discriminate against them if they happen to invest in public service industries? Three answers here are pertinent. First, utility investors bargain for dollar safety rather than purchasing power safety when they buy utility securities for their relatively stable return in dollars. Second, since over two-thirds of utility capital is commonly raised by the sale of fixed income bonds and preferred stocks, any gain from rising prices goes only to common stockholders anyway. Third, in periods of sharp deflation, a strict adherence to the reproduction cost basis would cause serious losses to investors and destroy the credit standing of utilities. It is not at all certain that the reproduction cost basis would serve the interests of all investors at all times.

Although many advocates of "prudent investment" would

admit the validity of the foregoing arguments, they contend that the same results can be achieved by the simple device of changing the rate of return rather than the rate base. This would avoid all of the uncertainty, costly litigation, and regulatory failure that inevitably attend so equivocal and uncertain a rate base as reproduction cost. As long as experts disagree violently on cost of reproduction and fair value, the regulatory process, as presently conceived, must rest on shifting sands. If we need flexibility let us provide it in a way that does not demoralize the regulative process. Why not permit utilities to earn a higher rate of return in good times and a lower rate in hard times without changing the rate base? Obviously such a step would not help the holders of fixed income securities. Then there are these questions: Would higher utility rates and a higher rate of return even in prosperity provide a convenient stick for the political opportunist and the advocates of public ownership? Would utility common stocks be more or less attractive if they had a leverage that exaggerated the ups and downs? Would it not be better to build up a "rate equalization reserve" by maintaining rates in prosperous years and drawing on the reserve to promote low rates in depression? Or must we have some "equalization" plus some variation in the rate of return to insure a continuing flow of capital?

Complete inflexibility is not a necessary concomitant of "prudent investment" and devices less demoralizing than a shifting rate base seem to provide at least partial solutions to the problem of fixing a reasonably definite and stable rate base and at the same time assuring needed adaptability in a world of flexible prices. An enlightened practical approach by both management and regulatory commissions offers a more hopeful solution than attempts to apply the abstractions of law or economics. The Supreme Court in its recent valuation decisions has opened the door to a more realistic approach to rate regulation, and it seems unlikely that the inflation that has accompanied and followed World War II will again raise the "valuation controversy" to the pre-eminence it attained after World War I. Only by unduly restrictive and arbitrary rate policies would

commissions bring again to the spotlight an issue that for the moment is relegated backstage.

Rate of Return.—Although of equal practical importance with fair value, a "fair rate of return" has not been subject to the same painstaking care as have the various items in valuation. It is obvious that the difference between a 6 per cent rate of return and one of 9 per cent is as great as the difference between a rate base of \$10 million and one of \$15 million. Yet there has been little attempt at precision. On the economic side, the rate of return must be high enough to attract capital. On the legal side it must avoid confiscation, and on the ethical side it must be fair to those who have committed their capital to the enterprise. But it is never quaranteed. It can be obtained only by rendering service at rates that customers are willing to pay. Moreover, each year stands on its own feet. Rates cannot be pushed below remunerative levels because returns in past years have been excessive, nor pushed above "reasonable" levels because past returns have been low.

Actual rates of return have varied considerably. Commissions may permit rates high enough to maintain credit and attract capital, in which case the reasonable rate of return may be considerably above the confiscatory level as defined by the courts. Yet the courts have not been blind to economic factors when testing for confiscation. In the Bluefield Water Works case, 262 U.S. 679 (1923), the Supreme Court made one of its most prolonged pronouncements concerning the rate of return. It found that a rate that would "constitute just compensation depends upon many circumstances and must be determined by the exercise of a fair and enlightened judgment" in view of the market rate and of risks and uncertainties. "The return should be reasonably sufficient to assure confidence in the financial soundness of the utility, and should be adequate, under efficient and economical management, to maintain and support its credit and enable it to raise the money necessary for the proper discharge of its public duties." And what is reasonable at one time may be unreasonable at another. The court had held that 6 per cent was a fair return for a manufactured gas company in New

York City in 1909, since the investment was "safe, returns certain, and risk reduced almost to a minimum." (Willcox v. Consolidated Gas Co., 212 U.S. 19.) The 6 per cent rate of return was found reasonable for gas companies in Cedar Rapids in 1912 and Des Moines in 1915. As a result of World War I, rising interest rates, and commodity prices, there was a tendency for courts to fix 7 or 8 per cent as a minimum needed to avoid confiscation. In all reported public utility cases from 1915 to 1930 the allowed rates of return varied from 5 per cent to over 9 per cent and averaged nearly 7½ per cent. Since public utilities could commonly raise from one-half to threequarters of their capital by floating bonds and preferred stocks at lower yields, the common stocks received substantially higher returns from trading on the equity. After 1930, as interest rates and prices slumped, and regulation became more strict, typical "fair" rates of return declined to the 6 to 7 per cent range, with a scattering above and below. The Supreme Court upheld a 6½ per cent rate of return as found by the Federal Power Commission in the Hope Natural Gas Company case, 320 U.S. 591 (1944), although the company asked for an 8 per cent return.

This lower rate of return does not seem to be inadequate from either a legal or an economic point of view. The Edison Electric Institute reported that the entire private power industry had income after expenses sufficient to equal a return of 5.65 per cent on its invested capital in 1944 and 5.90 per cent in 1945. In view of the fact that power company bonds were sold in 1945 at an average interest cost of 2.90 per cent, preferred stock on a dividend yield basis of 3.98 per cent, and common stock on an earnings basis of 5.71 per cent, the average rate of return left some margin for credit improvement and plant expansion.²

Three additional observations may be made in conclusion. The first is that rates of return that maintain credit or attract capital are not necessarily fair rates of return. For a concern with too large a burden of fixed charges, excessively high rates would have to be imposed on the public to rescue its credit posi-

<sup>See Public Utilities Fortnightly, September 17, 1931, p. 330.
See Barron's, August 5, 1946, p. 9.</sup>

tion. This is unfair to the ratepayer. Yet commissions are sometimes faced with the difficult choice of fixing rates high enough to attract new capital or seeing the utility gradually succumb to financial anemia, with the consequent threat to standards of service. Here the need for commission control over security issues is manifest, and perhaps in some cases a complete financial reorganization is called for.

On the other hand, a company that is undercapitalized would be penalized for its conservatism if it were allowed only a rate of return that would keep its credit good. Care must be taken that corporate capitalization, which we found was defective as a basis for determining reasonable rates, does not in fact become such a basis by exercising a dominant influence upon the rate of return. With effective and fair regulation this danger should not be great.

Another consideration is that the rate of return should be used to stimulate efficiency, if possible. The "sliding scale" device, already discussed, is an attempt to induce a reduction in utility prices by permitting a higher rate of return. Although these systems do not work automatically, the idea is sound. If by effective regulation we prune away all the gains from increased efficiency, we can hardly expect aggressive management programs of innovation, cost cutting, and rate reductions. This is one of the unsolved problems of regulation. In our obsession with "fair return on fair value"—no more, no less—we are in danger of depriving regulated industries of the dynamism that makes for progress. Fortunately, regulation seems to have been tardy in snatching away all the gains and so may have deadened initiative less than if it were 100 per cent effective.

Yet it is difficult to see how this bench mark of fairness and legality can be dispensed with. Commissions have been permitted in a few states, such as New York, to make emergency rate orders that are temporary without making a finding of fair return on fair value, but the general tendency is for courts to look with disfavor upon this device as a denial of "due process." In some cases, commissions have found "rate making by conference" to be effective, wherein the utility "voluntarily" adopts lower rates under commission pressure, without a contest in

the courts. The state of Massachusetts is reputed to have avoided the fair value controversy almost entirely by inducing regulated utilities to go along with the commission's policy of fixing rates so that the returns on book values and capital structures were adequate. If Massachusetts utilities attempted to have rates raised on the basis of extreme interpretations of the reproduction cost rule, the commission might have adopted a more restrictive regulatory policy or might have encouraged new competition by granting additional franchises.

It remained for the Wisconsin Public Service Commission recently to go the whole way and ignore the rule of "fair return on fair value" rule entirely. In a case involving the Commonwealth Telephone Company, a small concern, it refused to find a rate base, but stated that the reduced rates it ordered would result in an annual profit of \$12,500, which it thought was "reasonable"—on what basis it did not say, although it specifically refused to judge it by the "fair return on fair value" standards. The state circuit and supreme courts found this omission to be so serious that the commission's order was reversed on the grounds that it violated the due process clauses of the Constitution. This decision would seem to indicate that recent Supreme Court findings have not removed the valuation problem from the regulatory process, even though they may have greatly simplified it.

REFERENCES FOR FURTHER READING

Barnes, I. R. Cases on Public Utility Regulation. (New York: F. S. Crofts & Co., 1938).

Clark, J. M. Social Control of Business. 2nd ed. (New York: McGraw-Hill Book Co., Inc., 1939), Part III.

Fainsod, M., and Gordon, L. Government and the American Economy. (New York: W. W. Norton & Co., Inc., 1941), Ch. 10.

Glaeser, M. G. Outline of Public Utility Economics. (New York: The Macmillan Co., 1927), Chs. 28-30.

Jones, Eliot, and Bigham, T. C. Principles of Public Utilities. (New York: The Macmillan Co., 1937), Chs. 7, 8.

Koontz, H. D. Government Control of Business. (Boston: Houghton Mifflin Co., 1941), Ch. 15.

Nash, L. R. The Economics of Public Utilities. 2nd ed. (New York: Mc-Graw-Hill Book Co., Inc., 1931), Chs. 7-10.

Thompson, C. W., and Smith, W. R. Public Utility Economics. (New York: McGraw-Hill Book Co., Inc., 1941), Chs. 13-20.

Troxel, C. E. Economics of Public Utilities. (New York: Rinehart & Co., Inc., 1947), Chs. 19-28.

Welch, F. X., ed. Cases on Public Utility Regulation. (Washington: Public Utility Reports, Inc., 1946).

Chapter 21

REGULATORY TRENDS AND PUBLIC POLICY

Perhaps enough has been said about the theory and practice of regulated monopoly in the public utility and railroad industries to yield an over-all perspective of this type of control as an alternative to enforced competition. Certainly there is no convincing proof that regulation is an effective substitute for competition, where competition is feasible, but in the public service industries it may be preferable to the diseconomies and disturbances of competition. Competitive forces, as we have seen, play an important part in the pricing of railroad and some utility services, but they cannot be depended upon for full protection from unrestrained monopolistic prices.

Yet we cannot overlook the fact that even in circles friendly to a large measure of government interference in business, regulation has frequently been termed a "failure"—a criticism so often repeated in the early 1930's that it gained wide acceptance. Some who favored public ownership saw regulation as an unsatisfactory half-way house on the road to their objectivesocialism. Others contended that regulation had failed largely because it was not really tried; we had the form but not the substance, and what was needed was to implement regulation by granting greater authority to regulatory commissions, cleaning house of weak commissioners, and giving the reformed commissions adequate support. A third attitude was that regulation, no matter how effective, was incapable of providing a complete solution to the problem because all it could do was to control profits and eliminate discrimination—worthy objectives, but essentially negative ones. The course actually taken was the enactment of further legislation by both state and federal governments for the purpose of strengthening state commissions

and closing the gaps in regulation through federal laws pertaining to the interstate aspects of utility operations, and to the holding company. New devices to supplement commission regulations were also introduced by the federal government in the electric light and power field.

Federal Regulatory Legislation.—Under the Public Utility Act of 1935 (Title II) the Federal Power Commission was given authority to control the interstate transmission of electricity by private (but not government-owned) utilities at wholesale. The commission has jurisdiction over interconnection of power facilities and can require power exchange and coordination; it can control rates, service, accounts, security issues and combinations of interstate power companies. The same law (Title I) gave the Securities and Exchange Commission extensive authority to control and simplify power and gas holding companies and their subsidiaries, as was discussed in Chapter 11. So now an electric utility may be subject to at least three masters: the commission of the state in which it operates; the Federal Power Commission if it transmits power across state lines; and the Securities and Exchange Commission if it is a holding company or a subsidiary.

There are obvious dangers in the overlapping and duplication of authority, and a challenge to "states' rights" in regulation. These dangers have been minimized by provisions in the federal acts designed to avoid head-on collisions with states. In general, the federal legislation was designed to deal with two phases of regulation—interstate transmission at wholesale and holding company problems—that were beyond the power or competence of the individual states to deal with effectively. Where overlapping of jurisdiction exists, the laws provide for informal cooperation between state and federal authorities or the establishment of joint boards. Conflicts sometimes arise, however, and have developed in such matters as permission to issue new securities. Then, too, the cost and problems of complying with three different sets of laws and three sets of commission rulings are not negligible items for many utilities.

The Federal Power Commission impinges on the power in-

dustry in still another capacity—through its control over water power projects. In 1935 Congress amended the original Water Power Act of 1920, giving greatly increased power to the commission. No one may construct water power plants on navigable streams without securing a permit or license from the commission. The licensee's plans must be approved by the commission; he must agree to pay excess profits to the government; and the plant is subject to acquisition by the government during or at the expiration of the license (which may run as long as fifty years) on the basis of net remaining investment. The commission may prescribe accounting practices and even regulate service, rates, and security issues of licensees if that is not done by state commissions.

Outside the power industry, the federal government has consolidated and increased its control over other utilities. The regulation of telephone and telegraph services was placed under the Federal Communications Commission by the Communications Act of 1934. These services had (since 1910) been subject to regulation by the Interstate Commerce Commission, but they were not energetically regulated. Radio broadcasting, after a varied history of experimental regulation, was placed under the F.C.C. in 1934. It is not regulated in the same thoroughgoing way as other public utilities but the F.C.C. has authority to allocate frequencies and holds almost life-and-death powers over broadcasting companies by its discretion to grant, deny, or renew licenses to broadcast. However, it has no control over the charges made for broadcasting.

The federal government has controlled the interstate transmission of natural gas since 1938. Under the Natural Gas Act of that year the Federal Power Commission has powers over service, rates, accounts, and reports of companies engaged in the transmission (not in local production) of gas. This service has grown by leaps and bounds and the F.P.C. has exercised considerable influence in its development. Although it is specifically denied control over the production and intrastate transmission of gas, its power to fix interstate rates has led it to reach back into such matters as costs of these local operations. Companies subject to its control have objected to some of its rate

findings, as we have seen in our discussion of valuation cases. Further criticism has been voiced against the F.P.C. for basing delivered rates on unfairly low prices of gas at the wells, some of which are owned by the transmission companies.

Perhaps as important as the vast extension of regulatory machinery has been the recent reluctance of the courts to upset commissions' orders. The self-denying decisions and the end of the reproduction cost standard should do much to expedite the regulatory process. Given competent commissioners, who are appointed rather than elected, and are completely separated from partisan politics and from the influence of the utilities, with adequate salaries, longer terms, and greater security of office, with jurisdiction over all important phases of utility operations (including municipal utilities), with a strong sense of the need for experimentation and innovation, and with a desire to be constructive instead of merely repressive, regulatory commissions might well make regulation effective and workable. Evidence of improvement is not lacking and both the consuming public and the regulated industries seem to have recovered their faith in the general fairness of regulatory commissions.

Leading Questions in Regulation.—The question of whether regulation can ever be completely satisfactory is not subject to a dogmatic answer. Is there a way of limiting profits and yet insuring efficiency, aggressiveness, and providing incentives for private management? How can we get rid of countercyclical pricing as long as we base the rate level upon cost and restrict profits in good times? Can we secure public acceptance of a constructive approach to the utility problem? Is regulation always to operate on the assumption that rates should be pushed down, never increased? How can we expedite both rate increases and decreases?

Can the determination of individual rates for public utility or railroad service ever approach the "scientific" or must we honestly face up to the fact that cost finding for particular services is crude and arbitrary and that rate making contains large elements of expediency, what-the-traffic-will-bear, and historical inertia? Are seemingly inconsistent policies reconcilable, such as breaking up holding company systems in the power industry and advocating consolidation among railroads, or fostering unregulated municipal competition in power and light and trying to restrict competition by "coordination" among railroads and by the regulation of competing carriers by water and highway? Or should we recognize new competition (in transportation, for example) as reducing rather than increasing the need for regulation?

Are public ownership and operation or more direct devices for regulation more promising than regulation by mandatory commissions? These are fundamental questions of public policy, the answers to which will affect the welfare of many private concerns. And there are no absolute and final answers in the abstract. As a people we find little appeal in ideologies; we are likely to judge by pragmatic results. Perhaps that is why there may be logical inconsistencies in our approach to the regulation of industries.

Alternatives to Commission Regulation.—Before leaving the subject of utility regulation we will discuss the possible alternatives to regulation. In the depression years we heard much of methods of "direct action" to reduce rates—methods other than tightening the law and a wholesale replacement of commissioners. Short cuts in rate making through informal conferences between commissions and utilities were adopted; "emergency" rate reduction orders pending final determination of "fair value" were frequently issued in the early 1930's. With the advent of the Roosevelt administration, a "club in the closet" was provided by the federal government. It took several forms which we shall call regulation (1) by "yardstick" federal power developments, (2) by rate publicity, and (3) by the stimulation of municipal ownership and municipal competition.

Regulation by Yardsticks.—One device used to bring down private power rates has been the building of federally financed hydropower projects on the main rivers of the country. A beginning in this direction was made as early as 1928 when the Hoover (Boulder) Dam project for flood control and irrigation on the Colorado River was authorized. Power was to be gener-

ated and sold at revenues to liquidate the project in fifty years; later the date was changed to 1987. However, this did not put the government into the power business since the generating facilities were leased to public and private power enterprises, largely the city of Los Angeles and the Southern California Edison Company. Certainly President Coolidge would scarcely have looked upon this project as a yardstick of reasonable private power rates.

But the Tennessee Valley Authority, created in 1933 to take over a government nitrate and power plant which was built to produce explosives during World War I, came to be widely heralded by the Roosevelt administration as just such a yardstick. The bill creating the authority emphasized the importance of the project in controlling floods, promoting navigation. and conserving resources, but its primary purpose in fact was probably to produce power, and it was looked upon as a great victory for the advocates of public power. The Authority does not distribute power at retail but generates, transmits, and sells it, preferably to municipally owned plants which agree to abide by T.V.A., rules, including a uniform schedule of rates for electricity. However, considerable power has been sold to industries and to private power companies. Power for resale has been sold for about 1/2 cent per kilowatt hour, and the standard retail residential rate is 3 cents per kilowatt hour for the first 50 kilowatt hours, 2 cents for the next 150, 1 cent for the next 200, with a minimum bill of 75 cents per month.

The Authority has been given a large measure of discretion to develop the water resources of the entire valley region and it has vigorously pushed the program of dam building, acquiring private transmission lines and promoting municipal ownership, with the Public Works Authority applying pressure to private owners to sell under the threat of granting and lending money to municipal enterprises to duplicate their facilities. The Authority survived tests of its constitutionality in the courts. In 1936, in Ashwander v. Tennessee Valley Authority, 297 U.S. 288, the Supreme Court upheld the right of the federal government to dispose of the power developed at the war-built Wilson Dam as coming within its war powers. Two years later, in Tennessee

Electric Power Company v. Tennessee Valley Authority, 306 U.S. 118, the court in effect sanctioned the construction of new power dams by holding that the power company, which did not have an exclusive franchise, had no standing in court to question such government-supported competition.

Assuming that it may be desirable and constitutional to spend federal money to improve navigation, provide flood control, promote agriculture, and develop recreational facilities in one section of the country, we may ask if the T.V.A. experiment is a true yardstick of private utility rates, particularly of residential rates. If we seek a yardstick of costs of private power, the answer is undoubtedly in the negative. That is true because T.V.A. pays no federal taxes, no interest on the government investment, and can shift part of the cost of facilities used jointly to operations such as flood control and navigation. None of these advantages is available to private power companies, and since they constitute a large part of the costs of hydropower the yardstick of cost is defective.

Of course, T.V.A. does make some payments to state and local governments in lieu of taxes, but it pays none of the federal taxes which weigh heavily on private power companies. In 1947 T.V.A. paid an amount equal to about 4 per cent of its revenues in lieu of taxes, while private utilities paid about 20 per cent of their revenues in taxes.

The total cost of building T.V.A. to date is about \$750 million, of which only about \$450 million has been charged to power. The rest has been charged to flood control, navigation, and other purposes. Even assuming there are some special costs for the latter purposes, the allocation has been debated and has frequently been challenged as being unduly low for a project whose primary purpose is the production of power. Anyway it would be a true yardstick of cost only for a private utility for which the government would bear half the cost of the dams and reservoirs in the name of flood control and navigation. But T.V.A. is not charged a reasonable rate of interest on the \$450 million invested for power. Interest alone at 3 per cent (a rate on which no private company could live and grow) on the entire cost would be \$22 million a year, and for power alone

\$13 million a year. Yet the highest reported "net operating income" from T.V.A. sales of power was \$19 million in 1945, out of gross power revenues of \$39 million. In 1944 the reported "net" was \$15 million and in 1946, \$16 million. This, of course, is before deducting any interest, federal taxes, or the expenses of the flood control, navigation, conservation, or fertilizer programs. Moreover, this figure reflects the favorable and unforeseen war and postwar demands for power. The prewar "net" was much lower.

If private taxes and reasonable returns on invested capital are included in costs, it is easy to see that, to date at least, T.V.A. has not furnished a true vardstick of the reasonable cost of private power under typical conditions. It has been estimated that on an over-all basis, operating costs plus the actual interest paid on funds advanced by government to T.V.A. have exceeded total revenues by over \$100 million for the fourteen years ended in 1946. Granted that costs are likely to be high relative to revenues during the early years of development, this record seems to place a heavy burden of proof on those who so confidently predicted that the T.V.A. would "pay for itself" in twenty-five or fifty years—a rather rash prediction for the whole program, and a very questionable one for power alone, unless rates are raised. It must also be noted that T.V.A. costs affect only the wholesale rate for energy, which accounts for only about one-fourth of the price the residence consumer pays. The rest is made up of local distribution costs over which T.V.A. has little control. Therefore the yardstick affects only a fraction of the total costs of the service.

There has been some disagreement among those within T.V.A. as to its significance as a yardstick. Some deny that T.V.A. provides a yardstick of reasonable rates from the standpoint of costs, but they have maintained that it does provide a yardstick of the extent to which the use of electricity can be stimulated by low rates, that it is a useful test of the elasticity of demand for electric service. This is certainly a much more defensible position. In fact, one wonders if the Authority, working out its standard residential rate long before it knew what the ultimate costs of the project would be, was not more con-

cerned with setting a low rate and stimulating usage as a sort of standard for private utilities to emulate than it was in fixing rates to cover costs. Its contribution in testing the potential demand for electricity should be recognized even though it provided no accurate guide to reasonable private rates. No doubt its initiative led at least some private companies to expand the use of their services by promotional pricing, although many companies had started programs of rate reduction before the advent of T.V.A.

Private utilities should be permitted to cover the costs they incur in performing the service. Such costs vary from place to place and cannot be measured by the subsidized program of the T.V.A. However, if those costs can be covered by selling more power at lower rates it is to the interest of both the public and the utility that it be done. Perhaps nothing as costly as T.V.A. was necessary to show that lower rates mean greater total revenues, but it was worth something to have that pragmatic demonstration in a large area.

Other aspects of T.V.A. will have to be judged on noneconomic grounds. There seems to be no conclusive proof that navigation benefits have been worth what they cost; and there is no conclusive proof that a multiple-purpose project is the most effective for controlling floods, or that the development of farm fertilizers could not have been worked out better in other ways, or that the attractive and useful recreational area could not have been provided for otherwise, or that large federal spending of money, raised elsewhere, for the benefit of a particular area is sound public policy. One of the difficulties of such public-subsidized projects is that they are never subjected to the economic test of the market place, and there is no way of knowing how much should be spent merely because a thing is "good" or even "socially desirable." Of course, the cheap and abundant power of the Tennessee Valley played a vital part in the vast expansion of aluminum output during World War II-and, although not originally so intended, T.V.A. power may have justified itself on political grounds as an instrument of war. But it raises the question: Given the same government subsidy and encouragement, could not private power companies have developed our

water resources as adequately? Here we enter the realm of conjecture where personal opinions vary greatly, and social philosophy may outweigh cost accounting.

As we consider extending the T.V.A. idea further, it might also be pertinent to ask whether hydropower is so cheap (if all costs are included) now that technological developments have sharply reduced the cost of steam generation, and when allowances are made for the unevenness of water flow. (Even T.V.A. has asked Congress for money to build a steam stand-by plant.) Obviously the answer can be given only in the light of particular situations, and generalizations are futile. However, a considerable body of opinion holds that much water power is not "cheap" power if all costs are considered.

Regulation by yardstick has been extended to some extent to other large river developments. Both the Bonneville Dam and the Grand Coulee Dam on the Columbia River are giant power projects built and operated by the federal government. The Bonneville Power Administration of the Department of the Interior is the sales agency for both projects, but the Corps of Engineers (Defense Department) operates Bonneville and the Bureau of Reclamation (Department of the Interior) operates Grand Coulee. Bonneville is expected to cost about \$86 million, of which \$59 million will be charged to power and \$27 million to navigation and flood control. The ultimate cost of Grand Coulee is expected to be \$714 million of which \$141 million will be charged to power and \$534 million to irrigation, and the rest to other purposes. Reflecting their origins, both projects favor publicly owned power distribution and have had the effect of furthering municipal ownership in the Pacific Northwest where public power has always been popular. Nonetheless in 1946 only 13 per cent of the revenues of these projects came from the sale of power to municipally owned public utilities, 52 per cent from sales to industries, and 35 per cent from sales to private utilities. The government investment in the projects running into several hundred millions of dollars is expected to be recovered (with interest) within fifty years, and rates are to be set with this objective in mind. No special authorities have so far been set up for the projects, and affairs are in the hands of administrative officers, subject in some respects to the jurisdiction of the Federal Power Commission. The vast supplies of surplus cheap power from these power projects may well attract new industries, such as the manufacture of aluminum, and strengthen the economic base of that area at some cost to competitive areas.

A proposal by the National Resources Committee and President Roosevelt to create seven conservation districts similar to T.V.A. was embodied in the Norris and Mansfield bills, but failed to get the approval of Congress.

Regulation by Rate Publicity.—Another method of direct regulation that developed during the 1930's might be called "regulation by comparison" or "regulation by publicity." For a long time the rates charged by Ontario-Hydro in Canada were compared with those prevailing in the adjacent United States area—invariably to the disadvantage of the latter. Careful studies revealed some differences in such important cost items as taxes, depreciation, and interest on the investment, but until the T.V.A. the publicly owned project in Ontario, with its low rates, was frequently cited as proof of excessive rates and the failure of regulation in the United States.

Soon after 1933 one of the jobs of the Federal Power Commission was to make extensive rate surveys and to publish the costs of electricity in all cities and towns of different size classifications in the United States, whether served by private or municipal plants. These comparisons showed great disparities in charges in different places and were given wide publicity in the public press. Such comparisons were effective in arousing public sentiment in high-rate cities and in placing their utilities on the defensive. Of course, it was the purpose of the comparisons to show that rates in high-rate cities were too high rather than that others were too low. The comparison of rates charged by municipally owned plants with those of privately owned plants took on the proportions of a crusade. However, the facts showed that low rates and high rates were characteristic of both municipal and private operations.

As a sanction to make rate comparisons effective, the threat of municipal ownership was held over the heads of private utilities. Although President Roosevelt as a candidate for office in a campaign speech in Portland, Oregon, in September, 1932, said: "The development of utilities should remain, with certain exceptions, a function of private initiative and private capital," he became a severe critic of the power industry. Not only did the T.V.A. provide his promised national yardstick of reasonable rates, but the National Industrial Recovery Act provided a fund of \$3.3 billion out of which the Public Works Administration could make grants (gifts) of 30 per cent and low-interest loans of 70 per cent of the cost of public works projects, including municipal power plants. Subsequently, grants were increased to 45 per cent of the total cost.

Faced with the threat of this kind of subsidized competition, private companies in disputed areas either reduced rates or were forced to sell out to municipalities or power districts. It was a stated policy of the administration to use its power to grant or withhold funds as a lever to force lower rates by the uneconomic expedient of duplicating private facilities if necessary. Thus the Public Works Administrator, Harold L. Ickes—himself a caustic critic of private utilities—became a sort of "strong arm" in the apparatus of direct rate regulation. Although most of the rates were subject to state commission control, his judgment as to what were reasonable rates generally had weight if enough sentiment in favor of public ownership could be drummed up.

Such a policy sets up an entirely new conception of how to determine and effectuate reasonable rates; it can be used to force price concessions in any industry, even if it were just meeting private costs, since a heavy government subsidy is involved. The merits of such a policy should be judged apart from the question of whether government or private operation is superior. Arguments and instances favoring one or the other abound, and one has little difficulty in citing "facts" that "prove" the superiority of one over the other. The point is that the decision favoring one over the other should be reached only after considering all economic costs and the likelihood of enlightened and efficient management in each particular instance. Pressures exerted by a critical federal government, armed with public money, may obscure the issue. And even if its most important

global result was not to municipalize electricity but to demonstrate to private concerns that they might live as well from low rates as from high rates, there is an obvious question of fair play involved. Did the end justify the means?

The impact of federal power policy upon rates and consumption cannot be precisely measured. Average rates have traced a long downward course; and increased usage, the desire of utilities to expand revenues, and regulation all contributed to that result. It is estimated that the average cost of domestic electricity was 22 cents a kilowatt hour in 1893. By 1913, when strong state commissions were being established, the average rate had fallen to less than 9 cents per kilowatt hour. Despite the inflationary effects of World War I, the average in 1926 was 7 cents per kilowatt hour, and 6 cents in 1931. By 1936 the average was down to a little less than 5 cents, by 1941 to 3.73 cents and by 1946 to 3.22 cents. Annual consumption, of course, increased from 583 kilowatt hours in 1931 to 1,329 in 1946. It thus appears that the "drastic" change in power policy in the 1930's speeded up the historical downward trend in rates, no matter what its effects may have been in certain localities or areas.

However, average revenues may be misleading, since they are affected by higher consumption. Have there been any changes in basic rate schedules that were peculiar to the period in question? Here, too, conclusions can be only tentative since averages for the country at large conceal particulars. Federal Power Commission figures have been cited to show that average basic rates for specific amounts of domestic electricity declined about as much in the eight years before 1932 as in the eight years following. For example, the basic average rate for 100 kilowatt hours in 1924 was 6.2 cents; by 1932 it had fallen to 4.7 cents, by 1940 to 3.9 cents, and by 1947 to 3.6 cents. For 250 kilowatt hours the rates were 5.3, 3.8, 2.8, and 2.7 cents for the various dates, respectively. The small decline between 1941 and 1947 perhaps reflects the war inflation and the approach of rates to the "irreducible minimum," as well as the

¹ Moody's Public Utilities, 1947, p. a10.

relegation of the "power problem" to the background during the war. And only the future can disclose whether residential current will ever be sold by private utilities at an average rate as low as 1.78 cents per kilowatt hour—the rate paid by residential users of subsidized T.V.A. power.

Despite increased government interference the electric light and power industry at large has not become "socialized." While public power grew rapidly under the favorable climate of the New Deal, private power companies still owned 80 per cent of all installed power capacity in 1946, the federal government owned about 10 per cent, and municipalities and power districts about 10 per cent. In 1931 private power represented over 93 per cent of the total, and the federal government's share was less than 1 per cent. Actual power output was distributed in about the same proportions as capacity. Other measures of importance should be carefully scrutinzed. For example, in the period 1917-37 the number of private power stations actually decreased from 4,224 to 1,340, but this was a result of the economies of interconnection and central generation rather than of a relative decline in the private industry. There were actually more municipally owned stations in the United States than privately owned—1,860 as against 1,340—but they were so small that their output is modest in relation to the whole. Incidentally, it might be noted that the number of municipally owned stations increased only from 1,802 in 1932 to 1,860 in 1937—during one of the most active campaigns we have ever had for municipal ownership. During the same period, the number of private stations decreased from 1,627 to 1,340.

Government Ownership and Operation.—The possibility of solving the "public utility problem" by government ownership and operation has always been an alluring one, particularly to those who have ideological reasons for distrusting private enterprise. The relative advantages of government operation as against regulated private operation have been discussed loudly and long with conclusive "proof" that one or the other is superior. Yet the impartial student finds that arguments on both sides are likely to be inconclusive. Both sides have resorted

to misleading propaganda parading as "facts" and have lost few opportunities to get in a good word for their cause. Probably the safe attitude is to test carefully the arguments of both and realize that the controversy has produced more heat than light. There would be agreement that some services are susceptible

There would be agreement that some services are susceptible of government operation without too great inefficiency, or that some inefficiency can be borne in order to achieve other ends, such as protection, education, health, and conservation of resources. Perhaps our post offices or water supply systems might be more efficiently operated by private management, but there is no proof of it and most people accept government ownership and operation of these enterprises. Where operations can be reduced to a routine, where imagination, initiative, and freedom to experiment are not too important, where the costs of some inefficiency are not too great, and where performance can be judged by accurate accounting records, public ownership may produce good results, but conditions vary so greatly from industry to industry and place to place that no generalization seems warranted.

On the one hand, proponents of public ownership argue that regulation has broken down; that private companies are more interested in large profits than in low rates; that courts have hampered effective regulation; that write-ups, excessive fees, and other "hidden costs" have kept rates too high; that it is cheaper and simpler to operate than to regulate since regulation involves controversy and costly litigation; that the citizen by his vote can insure good service and low rates; that profits from municipal operation can be used to reduce taxes; that governments can borrow at 2 or 3 per cent while the fair return on private capital is 5 to 7 per cent; that cities like Los Angeles, Seattle, Kansas City, and Jamestown, New York, have shown initiative and resourcefulness in managing their power projects; that only government can undertake projects where power is tied in with navigation, flood control, and conservation; and that political corruption caused by regulated private utilities would cease under government ownership and operation.

On the other hand, the advocates of private operation argue that private operation is more efficient since it does not gain by padding its payrolls and appointing incompetent politicians to

office; that public regulation is more continuous and effective than the ballot, which is cast only about every two years and on so many issues that there is no clear mandate; that private companies have shown initiative in introducing better, cheaper, and more reliable service, and have built up integrated power systems that have been admired and copied in other countries of the world; that electricity rates have declined steadily; that utility taxes reduce burdens of other taxpayers; that private rates are lower than municipal rates; that losses and high costs of public projects are frequently concealed by questionable accounting methods of government bodies; that governments could not borrow large amounts without raising the cost of borrowed funds and straining their credit; that with few exceptions municipal utilities have shown little imagination in promotional pricing; that politics will always be a threat to efficient operation and proper cost distribution among customers; and finally, that hundreds of municipally-owned light and power plants have been taken over by private companies (largely before 1930), resulting in major rate reductions and improved service to consumers.

These arguments are not exhaustive but they suggest the reasoning of the two schools of thought. Many of the arguments we have examined; others should stimulate reflection and further study in the large available literature on the subject. In a country whose faith in individualism is still strong, and whose observations of government in action are not always reassuring, there is—and probably should be—a heavy burden of proof on those who advocate the conversion of private to public enterprise.

Summary and Conclusion.—As we look back upon this survey of the governmental environment in which American corporate enterprise operates, we have seen that no single formula prescribing the proportions between enterprise and government regulation fits the needs of every situation. Even the most extreme advocate of laissez faire recognizes that government must provide the framework of protection and private contract to any economy that is both free and productive. Absence

of government breeds anarchy, insecurity, and uncertainty of reaping the rewards of enterprise and frustrates foresight and business planning. Free enterprise cannot flourish and work its social weal in such an environment: witness China and some of the South American countries which lack stable governments. Moreover, governments may and do provide many aids to private enterprise beyond the mere protection of property, persons, and the right to contract. The provisions of a sound monetary system, of standards of weight, measurement or content, the support of industrial, commercial, and agricultural research, the dissemination of information, support of free education, the protection of patents and copyrights, easy incorporation of business enterprises, and bankruptcy laws—these are only a few of the ways in which government acts to encourage economic activity.

Even steps such as the prevention of monopoly are in complete harmony with the essential rationale of the free enterprise system. And the regulation of the plane of competition, provided that it is not used as a cover to prevent competitive striving in the social interest, may be necessary to the preservation of wholesome competition.

Where competition is clearly uneconomical and unworkable, we have a third possible relationship between government and enterprise-namely, the regulation of prices and service. We have seen the problems involved in the regulation of utilities and railways, and the problems that remain despite the tightening up of state laws, the unprecedented extension of authority of the federal government, and the new attitude of the Supreme Court. Powers to restrain now seem adequate and regulation promises to be more successful from that point of view. Postwar permission by state commissions and the I.C.C. of rate increases on a clear showing of need to meet increased costs mirrors a constructive attitude. Threats, "clubs in the closet," and the stimulation of uneconomic competition by grants of public funds may have yielded good results in some instances, but they are likely to be sporadic, unscientific, and dictatorial. There is little in the "permit monopoly and regulate it" experiments of the N.R.A. type or in the bituminous coal industry to make us hasten the extension of the public utility concept to other industries.

Whatever may be the virtues of those depression-born experiments, it is clear that their primary regard was not for the consumer but for the interests of entrepreneurs and workers or other groups. The problems of determining a "fair price" (easy as it sounds) are almost insurmountable in the absence of a competitive market, and that concept can be easily juggled in the interests of pressure groups where government fixes price.

It is one of the anomalies of the 1930's that a competitive solution should have been sought in an industry long since subjected to regulation as a substitute for competition. Yet the fourth and fifth types of government control as evidenced by vardsticks and direct government competition were looked upon as a solution. These have been examined and it needs only to be said that they lack the essential requisites of a permanent solution. Yardsticks of demand elasticity may be wholesome if they are not misrepresented as yardsticks of reasonable rates. Direct competition between duplicate plants is uneconomic, although in a few instances it has worked where restraint and understanding have prevailed. The city of Cleveland, for example, has for a long time had competition between a city-owned plant, which serves a small section, and the Cleveland Electric Illuminating Company, which serves 85 per cent of the city and suburban areas. There is some overlapping of areas served. Competition has been of a "restrained" rather than an "all-out" sort, but it may be one reason why Cleveland enjoys low rates. In a few instances two private utilities may serve the same city, as in Portland, Oregon, but duplicate facilities are for the most part avoided. The city of Los Angeles was once served by two private power companies (the Los Angeles Gas and Electric Company and the Southern California Edison Company) and a city-owned plant. However, the City Department of Water and Power has taken all of the property of the former company and much of that of the latter and now enjoys a monopoly position. It is now recognized by advocates of public and private power alike that the kind of duplication of plant that is necessary for active competition is highly wasteful; and that in a "knock-down and drag-out" fight, a municipal plant, because it does not have to be self-sustaining and may enjoy such things as tax advantages, low capital costs, and inadequate accounting—to say nothing of gifts of 45 per cent construction costs under P.W.A. or preferences to power from all public power projects—is likely to be victorious, but at a cost. It is better for one or the other to yield before needless economic waste occurs.

The sixth possibility, government monopoly, seems to offer an economic alternative in some cases. Perhaps the choice in the field of public utilities should be between regulated private monopoly and government monopoly. The former has not been a universal failure; neither has the latter. Perhaps if the choice were between alert and public-minded private management under control, on the one hand, and government ownership and operation, on the other, the average American would choose the former. The preference for economic individualism is strong in important segments of our population. Neither public operation at home nor national planning (with or without public ownership) abroad has convinced the average citizen that he has much to gain by substituting "bureaucratic control" for what we have now. Perhaps it is just inertia, but it might well be a kind of practical wisdom.

Probably the average citizen knows little about the absurdities of seventeenth and eighteenth century state regulation that we now know as "mercantilism" or the even greater and more absurd restrictions on economic liberty that preceded it under the guild system. He may never have heard of Adam Smith or realized that laissez faire was a definite revolt against these restrictions. But he is not ready to say that those who would err on the side of economic freedom are wrong. Perhaps he would admit, with John Stuart Mill, that under certain circumstances government might take over almost any economic activity. But he is more likely to follow Mill when he insists that governments usually do most things worse than individuals and that, as a general rule, the purpose of government action should be the enlargement rather than the restriction of individual liberty. To those who believe that these liberties will be protected if only government is democratically elected, the citizen might reply. with Mill: "Experience, however, proves that the depositaries of power who are mere delegates of the people, that is of a majority, are quite as ready (when they think they can count on popular support) as any organs of oligarchy, to assume arbitrary power, and encroach unduly on the liberty of private life. . . . Hence it is no less important in a democratic than in any other government, that all tendency on the part of public authorities to stretch their interference, and assume power of any sort which can easily be dispensed with, should be regarded with unremitting jealousy. Perhaps this is even more important in a democracy than in any other form of political society; because, where public opinion is sovereign, an individual who is oppressed by the sovereign does not . . . find a rival power to which he can appeal for relief or . . . for sympathy." ²

Perhaps wars, depressions, class conflicts, economic adversities, and political developments may weaken this resistance to government encroachment. Although sentiment for government aids of some kinds, such as social security benefits, subsidies to agriculture, education, low-cost housing, and resource development, may grow in acceptance, it is not with the thought that they threaten the basic structure of private capitalism, but that they supplement (or even are necessary to "save") it. There is little evidence that, except in times of dire emergency such as war, the public at large is in a mood to accept wholesale interference by government with market-determined prices and production. The expiration of O.P.A. was not the result of a conspiracy of a few; it came from a genuine dissatisfaction with such "police state" methods in times of peace.

The essential framework of the competitive economy in the United States persists and shows that it has the vitality needed to survive, despite errors committed (sometimes in its name) by industry, labor, and government alike. Its productive potential has contributed greatly to winning two world wars and now is engaged in the gigantic task of relief and reconstruction in Europe and Asia.

Although government control has advanced greatly in the last few decades, our country is almost unique in the degree of economic freedom that survives. Whether recognition of our

² J. S. Mill, Principles of Political Economy, Book V, Ch. 11.

singular position will strengthen our determination to preserve private competitive enterprise as the rule, only the future can tell.

Meanwhile the pendulum swings back and forth between individualism and social control. The Republican sweep in the elections of 1946 was viewed as evidence of a public demand that wartime restrictions—particularly price controls by the Office of Price Administration—should be relaxed or abandoned in the shortest possible time. In fact the last vestiges of price control were dropped by President Truman just before the elections of that year. But two years later a swing in the opposite direction was evident as President Truman and a Democratic Congress won an upset election on a platform advocating wider governmental intervention in the form of inflation controls, the allocation of scarce raw materials, higher supports for farm prices, the expansion of social security, and the development of natural resources. To carry out this program Congress was asked to pass a number of laws extending government controls beyond previously-established borders. Even though parts of the program met an indifferent reception in Congress, no one can predict exactly what types of restrictions will receive public approval, given an economic environment which bristles with problems that call for solution. All that one can say is that faith in individual freedom and competitive enterprise seems to be stronger at home than in the rest of the world.

The reasons for this belief are obvious. The history of economic development in the United States and the widespread distribution of the benefits that have flowed from the capitalistic system lend support to those who would preserve its main features. The improvement in our standards of living has been unmistakable. Real income per capita is nearly five times as high as it was 150 years ago, despite a reduction of the work week from 64 hours to 40 hours in the past century. Our productive power has multiplied because of many factors, but prominent among them are initiative and inventiveness coupled with a constantly growing stock of productive capital equipment. Each worker in the manufacturing industries has the help of 6.4 horsepower in 1939 as compared with 1.3 horsepower in

1849. Efficient workers, and efficient and costly machinery, directed by capable management transformed our abundant resources into an ever-increasing flow of goods and services.

One of our foremost objectives should be to insure a continuation of the flow of private capital into productive uses, for this is how we move to higher and higher standards of living. There is no one easy formula to achieve this end, but certain questions of public policy and sound individual management must be faced. For example, those who purchase corporate securities must be protected, yet freedom to venture and take risks must be preserved. This means that security regulation must stop short of imposing undue burdens and restrictions upon new security issuance. It may even be desirable to permit greater freedom of institutional investors like life insurance companies to invest a small part of their resources in corporate stocks, either directly or through the medium of special corporations organized to provide risk capital to promising enterprises. A number of states now permit insurance companies, trustees. and savings banks to invest a portion of their funds in investment trusts owning common stocks. Although there are obvious dangers, it may be that as more and more of individual savings are entrusted to institutions, and as high income taxes discourage risky investments by the rich, some way ought to be found to make available to industry the capital provided by a host of small savers; and without the excessive flotation of debt securities.

Likewise, tax policies can have a profound effect upon the flow of capital into productive uses. At present our tax laws discriminate against the corporate form of enterprise by the complete double taxation of earnings. When the corporation pays a high tax on its income, and the stockholders must pay high personal income taxes on the dividends they receive out of the same earnings, the tax-gatherer may take a toll from corporate enterprise that is not in keeping with dynamic investment. Equally important are other income tax provisions permitting the averaging of earnings through the carry-over and carryback of losses in bad years to offset profits in good years. Special provisions for accelerating depreciation charges on new

investments, as was permitted for war facilities during World War II, might work to advantage in peacetime. Some observers would exempt from taxation earnings that are used to increase investment and employment in times of depression.

The present corporate income tax discriminates against equity capital and favors debt creation by permitting interest, but not dividends, to be deducted in determining taxable corporate income. Severe taxation of undistributed profits, whatever may be its virtue in preventing the evasion of personal income taxes, strikes directly at the most important internal source of equity capital. But tax reform is probably not enough to insure a high level of productive capital formation. The government must assume some responsibility for providing a climate that is favorable for a high level of private investment. How to achieve this is a matter of dispute between two schools of thought. One school would achieve a socially desirable level of capital formation through government measures designed to maintain a high level of national income. This is the philosophy of the Employment Act of 1946, which states "... that it is the continuing policy and responsibility of the Federal Government . . . to promote maximum employment, production, and purchasing power," and provides for the Council of Economic Advisers to the President and the Joint Committee on the Economic Report in Congress. The methods of achieving the objective are not specified in the act, but most advocates of this approach rely on government spending, taxation, and further intervention as the main implements.

The other school of thought emphasizes the need for government to spur private investment by following policies that make businessmen optimistic about profit prospects in the future. This means that government shall refrain from attacks on business and shall shape its policies concerning taxation, labor, prices, government competition, and other matters so as to remove the fears that restrain new commitments of funds to productive enterprise. They point to a century and a half of steady economic growth when government intervention was kept at a minimum in contrast to the prolonged depression in the 1930's when government intervention increased greatly, and when

government policies become more and more critical of private enterprise and private profits. Perhaps both schools are right in part and the two programs are by no means mutually exclusive. A healthy business climate and sound fiscal measures are both needed to evoke an adequate flow of private capital.

Finally, some of the responsibility for the continuation of economic progress under a system of individual enterprise rests upon management itself. There can be little doubt that progress has been made in orienting management's point of view toward a broader goal than that of maximum immediate profits. From the very force of circumstances managements realize that their responsibilities are not limited to the stockholders whose property they manage or to consumers whom they must satisfy. In increasing measure they have come to sense the impact of their decisions upon the public at large, which through the processes of democracy, holds the power to modify, or even to destroy the private enterprise system as we know it. The survival of economic freedom, with opportunities for corporate enterprise depends not only upon the policies of those having political and economic power, but upon the statesmanship and sense of stewardship displayed by the directors and managers of business.

REFERENCES FOR FURTHER READING

Abrams, E. R. Power in Transition. (New York: Charles Scribner's Sons, 1940).

Clark, J. M. Social Control of Business. 2nd ed. (New York: McGraw-Hill Book Co., Inc., 1939), Chs. 5-7, 29-32.

Collins, Frederick A. *Uncle Sam's Billion Dollar Baby*. (New York: G. P. Putnam's Sons, 1945).

Hayek, F. A. von. *The Road to Serfdom*. (Chicago: University of Chicago Press, 1944).

Jewkes, John, Ordeal by Planning. (New York: The Macmillan Co., 1948). Kellogg, C. W. Your Electricity and Your Money, Atlantic Monthly, January, 1946, p. 101.

Koontz, H. D. Government Control of Business. (Boston: Houghton Mifflin Co., 1941), Chs. 16, 24, 25, 30.

Lilienthal, D. E. TVA; Democracy on the March. (New York: Harper & Bros., 1944).

Lyon, L. S., and Others. Government and Economic Life. (Washington: The Brookings Institution, 1940), Chs. 23, 24, 27, 29, 32.

Mises, Ludwig von. Bureaucracy. (New Haven: Yale University Press, 1944).

- Mises, Ludwig von. *Planned Chaos*. (Irvington, N. Y.: Foundation for Economic Education, Inc., 1947).
- Persons, W. M. Government Experimentation in Business. (New York: John Wiley & Sons, Inc., 1934).
- Wootton, B. Freedom Under Planning. (Chapel Hill: University of North Carolina Press, 1945).

INDEX

Acceptances, 253, 256-257 Accounting, capital stock, 51-52 depreciation, 267-271 inventories, 271-272 regulation of, 230 reserves and surpluses, 272-275 Accounts receivable, borrowing on, 255-256 factoring, 260-261 working capital, 119 Adjustment bonds, 88-89, 102-103 Agricultural Marketing Agreement Act, 412 Agriculture, antitrust legislation exemption, 381, 401, 467 cooperative marketing, 412 noncorporate character of, 5, 6, 28, 358 After-acquired property clause, 93-94 Annual meetings and reports, 45-46, 61, 64 Antifraud legislation, 212-214, 226- 227 Antitrust legislation, 322-323, 377, 384 ff. exemptions, 388-389, 395-396, 411- 414 need for, 397-398, 506 ff. Assets, bonded indebtedness ratio, industrial corporations, 155-157 public utilities, 160-161 claims against, bondholders, 90-94, 95-96 creditors, 55, 56, 92, 299-303, 304, 308, 309 stockholders, 55-56, 79-80, 100- 101, 232 current, 119-120	Assets—Continued mergers, 315-318 preferred stock ratio, 157 reinvested earnings, 277 working capital (See "Working capital") Associations, joint stock, 19-23, 33 limited partnership, 36 trade, 382, 408-411, 412 voluntary, 23, 35 Assumed bonds, 101-102, 166 Automobile industry, 125 Bank acceptances, 253, 256-257 Bankers, options, 201-202 shares, 81 Banking Act, 179, 180 Banking syndicates, 185-186 Bankruptcy, reorganization in, 303-308 trustees in, 295 Bankruptcy Act, 92, 172, 233, 234, 468 Banks, capital structure, 173-174, 175 commercial, 178-180 loans, 252-256, 257-258 interlocking directorates, 178-179, 400 investment (See "Investment, banks") unincorporated (private), 179-180 Basing-point system, 382, 402, 404- 405, 406-407, 408, 458 "Best effort" agreements, 196 Bidding, competitive, 203-209 Bills of lading, 254 Bituminous Coal Conservation Act, 413-414 Block meter rates, 475-476
stockholders, 55-56, 79-80, 100-	
101, 232 current, 119-120	Block meter rates, 475-476
depreciation reserves, 271	Blue-sky laws, 177, 181, 197, 212-214
investment companies, 237-238 liquidation, 55-56	Board of Directors (See "Directors")
51	7

Bond houses, 181	Business,
Bonds, 86-114 (See also "Securi-	cycles,
ties")	current capital, 245-248
adjustment, 88-89, 102-103	dividends, 278-279
assumption of, 101-102, 166	expansion, 331-332
capital structure, 122-123	investments, 105-114, 130-132
collateral trust, 95-96	trusts, 34-35
competitive bidding for, 203-209	•
consols, 88	Capital,
conversion of, 102, 104	charter requirements, 44
coupon, 89, 99-100	circulating (See "Working capi-
direct placement of, 197-199	tal")
equipment trust, 96-98, 166, 203,	current, 241 ff.
323-324	business cycles, 244, 245-248
gold clauses, 87	dividends, 265 ff.
guaranteed, 100-101	loans, 252 ff.
income, 88-89, 102-103, 166	permanent, 248-249
industrial, 154-159	reinvested earning, 249, 250-251
interest, 88-89	reserves, 249, 250
investment,	seasonal demand, 245
companies, 237-238	securities issues, 249, 250
evaluation as, 104-114	temporary, 248, 249 ff.
issue limitations, 92-93, 100	trade credit, 251
joint, 101	dividends out of, 45, 271, 282, 288
long term, 88, 99	earnings and, 121-123
maturity of, 88, 100	reinvested, 136 (See also "Earn-
mortgage, 90-94	ings, reinvested")
after-acquired property clause,	fixed, 118, 121, 244
93-94	flexibility of, 122
perpetual, 88	inventories and, 243
principal, 87-88	marginal efficiency, 331 ff.
profit participation, 104	requirements, 118 ff.
provisions, 86-90, 104	stock, 51-53
public utility, 159-164	deposit ratio, 173-174
receivers' certificates, 103-104	incorporation fees and taxes, 47
registered, 89, 99	structure,
rights, 104	banks, 173-174, 175
sale and distribution, 176 ff.	industrial corporations, 119-120
security pledged, 89-90, 95	125, 154-159
short term, 88, 99	insurance companies, 173, 174-
underwriting commissions, 199-	175
201	public utilities, 119, 121, 159-164
unsecured, 89, 98-99, 102	railroads, 121, 164-173
voting powers, 100, 104, 232	turnover ratio and, 119-121, 242-
warrants, 104	243
Bonneville Dam, 500-501	surplus, 275
Book (trade) credit, 251	working (See "Working capital")
Borrowing and lending (See "Loans")	Capitalization,
"Loans")	construction companies, 167-171
Boycotts, 395	factors, 261
British Companies Act, 217	finance companies, 262
Broadcasting, regulation of, 493	investment companies, 236, 237-238
Brokers and dealers, regulation of,	mergers, 316-317
227-228, 229 Public Act, 22, 24	overcapitalization, 141-152
Bubble Act, 22-23, 24	partnership, 31, 32
Bureau of Corporations, 390, 398,	promotion and, 116 ff. proprietorship, 29
399	Urourietorsnid. Zy

Capitalization—Continued	Competition,
small businesses, 136-140	concentration and, 361-362, 367,
	369-370, 372, 373-374
subsidiaries, 95	enguings and 126
Capper-Volstead Act, 412	earnings and, 126
Cartels, 381, 382	failure and, 291
Certificates,	foreign trade, 411-412
bond, 86	laissez-faire, 23, 377-381
"convenience and necessity," 437	municipal ownership and operation,
incorporation, 40	495-501, 504, 508-509
receivers, 103-104, 296	open pricing, 409-411
stock, 52-53	prices and, 382-383, 447-448
voting trust, 59, 132	public utilities, 417, 421-423
Chandler Act, 233, 303, 307-308	rates and, 421-423
Charter,	restraint of trade, 377, 388 ff.
amendments to, 46, 65-66	Sherman Act, 388 ff.
contract theory, 10-12	unfair practices, 399, 401 ff.
development of, 19, 22, 23, 24-26	Competitive bidding, 203-209
duration of, 45	Composition, 293-294
franchises, 433-437	Concentration, corporate, 355 ff.
scope of authority, 43-46	economic power and public welfare,
stockholders' rights, 53-54	3 70-376
Chattel mortgages, 95	Consolidation, 315-318, 381
Clayton Act, 320, 391-392, 395-396,	leases, 324
398, 399-401, 412	railroads, 165, 166, 412, 467
Coal industry, 413-414	Consols, 88
Collateral,	Construction companies, 167-171, 230
order bill of lading, 254	Contingency reserves, 273-274
receivables, 255-256	Contract,
trust bonds, 95-96	exclusive, 262, 387, 389, 399-400,
warehouse receipts, 255	402, 403
Combination, 165, 318 (See also	partnership, 30 -
Combination, 165, 318 (See also "Consolidation"; "Mergers")	
Commona Count 465	theory of corporations, 11-12
Commerce Court, 465	tying, 400, 402
Commercial,	Cooperative marketing, 412
banks, 178-180	Corporations,
loans, 252-256	alien, 14
paper, 258-260	annual meetings and reports, 45-46,
Common stock,	61, 64
banks, 174-175	bonds (See "Bonds")
capital structure and, 122-123, 158-	by-laws, 40-41
159	charter (See "Charter")
classified, 82	concentration, 355-376
	economics of, 366-370
closed and open end companies, 238	
equity, trading on, 133-134	control of, 132-133
evaluation as investment, 104-114	de facto, 14
industrial corporations, 155, 157,	definitions, 10, 11, 15-16
158-159	development, 10-26
insurance companies, 175	contract (real) theory, 12-13
nonvoting, 59, 65, 66, 132	fiction (sovereignty) theory, 10-
public utilities, 160, 161-162	11, 12-15
holding companies, 162-163	joint stock companies, 19-24
railroads, 166, 167, 172-173	nonbusiness corporations, 18-19
stockholders' rights, 53-70	regulated companies, 19
	United States, 24-27
201	entity, 10
voting, 45, 82, 132-133	court rulings, 12-15
Communications Act. 493	failure, 55, 291 ff.

3	
Corporations—Continued	Debenture,
financial, 173-175	bonds, 89, 99-100
foreign, 42-43, 48	stocks, 81
importance, 4-7	De facto corporations, 14
incorporation (See "Incorpora-	Default,
tion")	collateral trust bonds, 95-96
industrial (See "Industrial cor-	equipment trust obligations, 96-97
porations")	foreclosure, 90-92
liability, 12-15, 70, 216	mortgage bonds, 90-92, 94
management (See "Management")	unsecured bonds, 99
nonbusiness, 17, 18-19	Deferred stocks, 81
officers, 41-42, 62	Demand,
records, examination by stock-	costs, 472-474
holders, 63-64	earnings and, 126, 128, 246-248
regulation (See "Regulation")	Depletion, 270-271
security selling, 176	Deposit agreements, 297, 304
size (See "Size, corporate")	Deposits, bank 173-175
small`	Depreciation, 267-271, 477-478
bonded indebtedness, 155	reserves, 244
financing, 136-140	Direct placement of securities, 197-
stocks (See "Stocks")	199
taxation, 29, 512-513	Directors,
valuation of, 478 ff.	election of, 67, 68
Costs.	interlocking directorates, 178-179,
capital, 342-344	384, 400, 403-404
customer, 472	investment trusts, 237
demand, 472-474	liability of, 41, 61-62, 216, 221-222,
earnings and, 126-127	237, 282
fixed, 470	powers and duties of, 41
flotation, 199-201, 219-221	selfdealing, 235, 237
incorporation, 38-39, 46-48	stockholders' control of, 58-59
labor, 342-345, 468	stockholding by, 228, 230, 237
original, 269-270, 478-479, 482	suits against, 61-63
output, 42	ultra vires acts by, 41, 61, 65
public utility, 470, 471, ff.	Discounts, 403, 408
public vs. private utilities, 497-499	Dividends,
rates and, 435-436, 454-456, 457,	capital and, 45, 271, 282, 288
468, 470-474	cumulative, /3-/3
reorganization, 303, 304, 307, 310	declaration, 54, 73, 74, 78 earnings, 45, 76-77, 157, 161, 265 ff.
reproduction, 479, 480-486	earnings, 45, /0-//, 15/, 101, 205 π.
Coupon bonds, 89, 99	expectation of, 279-280
Credit, 227	guaranteed securities, 81-82; 324-
companies, 261-263	325 bolding companies 294 295 297
line of, 254, 257-258	holding companies, 284-285, 287-
small businesses, 136-140	289
trade (book), 251	intercompany, 229 investment companies, 237
Creditors, bondholders, 94	legal considerations, 45, 282-283
claims priority of 55 56 02 232	loan considerations, 283
claims, priority of, 55, 56, 92, 232, 299-303, 304, 308, 309	noncash, 283-286
committees, 294, 296-298, 305	noncumulative, 75-78
holding companies, 13	overcapitalization, 148-149, 151
rights, 90-91, 232	preferred stock, 73-78
seizure of corporate property, 99	preferred stock, 73-78 property, 284-285
Cumulative dividends, 73-75	recapitalization, 73-74, 293
Customer ownership of stock, 193,	regulation of, 282-283, 286-289
194-195	reinvestment vs., 275-279
· · · · ·	

Dividends—Continued scrip, 283-284	Expansion—Continued failures and, 291
stock, 285-286, 288	law of diminishing returns, 340
surplus and, 45, 274-275	342
taxation, 103, 280-282	limits of, 338-340
Doherty (three part) rate, 476-477	Export trade,
"Dummy" incorporators, 43	acceptances, 256-257
	antitrust legislation and, 411-412
Farnings	
Earnings,	Face-account certificate
capital structure, 121-123 demand, 126, 128	Face-account certificate companies, 236
depreciation and obsolescence, 267-	Factoring, 260-261
271	Failure, corporate, and reorganiza-
dividends, 45, 157, 265 ff.	_ tion, 290 ff.
factors affecting, 123-128	Fair return, 451, 453-454, 477 ff., 486-
interest ratio,	489
industrial corporations, 155-156	overcapitalization, 150-151
public utilities, 161	Fair trade laws, 405-406
inventory valuation, 127, 271-272	Federal Communications Commis-
net, 477	sion, 493
overcapitalization, 148-149	Federal Power Commission, 268, 492-
patents and copyrights, 128	494, 501, 502
reinvestment,	Federal Trade Commission, 171, 195,
banks, 175	399, 401
current capital, 249, 250-251	399, 401 Federal Trade Commission Act, 392-
dividends vs., 275-279	0,0,0,0,0
expansion, 315	Fiction (sovereignty) theory of cor-
insurance companies, 175	poration, 10-11, 12-15
public utilities, 160, 161-162 railroads, 170, 172, 173	Finance companies, 261-263
railroads, 170, 172, 173	Financial, corporations, 173-175
stock dividends, 285-286	Financial plans (See "Capital";
taxes, 280-282	"Capitalization")
reserves, 272-274 salaries, 349-350	Fisheries Cooperative Marketing Act,
salaries, 349-350	
size of, corporate, 326 ff.	Fixed capital, 118, 121, 244
stock prices, 332	Fixed (unit) trusts, 236 Fixture rates, 474
surplus, 274-275	Flat rates, 474
taxation, 54, 280-282, 512-513 technological changes and, 128	Foreclosure, 90-92
Elkins Act, 464	Foreign corporations, 42-43, 48
Emergency Transportation Act, 412,	Foreign trade,
468	acceptances, 256-257
Employee ownership of stock, 193-	antitrust legislation and, 411-412
194, 195	Founders' shares, 81, 146
Equipment trust obligations, 96-98,	Franchise, 433-437
166, 203, 323-324	rate provisions, 435-436, 452-453
Equity,	_ taxes, 47-48
financing, 86 ff., 162-163	Fraud, 13, 181, 212-214, 226-227
receivership in, 295-300, 303-305,	Free enterprise, 23, 377-381
310	
trading on, 72, 129, 133-134, 162	Gentlemen's agreements, 382, 385
Esch Car Service Act, 465	Gold clauses, 87
Exchanges, regulation of, 227	"Good faith" rule of valuation, 145
Exculpatory clauses, 234-235	Grand Coulee Dam, 500-501
Expansion, 314 ff.	Granger movement, 386, 424, 425, 426,
economics, 326-332	438
,	

522 INDEX

Guaranteed securities, 81-82, 100-101, 166	Industrial corporations—Continued concentration of, 355 ff.
Guilds in corporate development, 18,	economic power and public wel- fare, 370-376
•	economics of, 366-370
Hepburn Act, 464-465	expansion of, 314 ff.
Holding companies, 318-321	economics of, 326-332
collateral trust bonds, 95	law of diminishing returns, 340-
common stock, 162-163	342
construction companies, 171	limits of, 338-340
dividends, 284-285, 287-289	Insolvency, stockholders' liability, 70
liability, 13-14	Installment credit companies, 261-262
liquidation, 56	Institutional investors, 97, 103, 136,
monopoly device, 381	138
preferred stock, 72-73, 162-163	direct sale to, 197
property dividends, 284-285	Institutions in corporate develop-
pyramiding, 162-163, 320-321 regulation, 229-233, 287-289	ment, 17-18
regulation, 229-233, 287-289	Insurance companies,
trusts and, 322-323	antitrust legislation and, 413
Holding Company Act, 287-288	capital structure, 173, 174-175
Hopkinson (two-part) rate, 476-477	Interest.
	bonds, 88-89
Income,	income, 102
bonds, 88-89, 102-103, 166	taxes, 103
taxes, 280-282	communities of, 384
Incorporation,	earnings ratio,
certificate, 40	industrial corporations, 155-156
charter, 10-12, 24-26, 40 (See also	public utilities, 161
"Charter")	factoring, 261
costs, 46-48	Interlocking directorships, 178-179,
ease of, 39-40, 49-50	384, 400, 403-404
fees, 38-39, 47	Interstate Commerce Commission,
state, 25-26, 43-48	268, 400
Indebtedness,	railroad rates, 413, 438-439, 461-
banks, 173-174, 175	463
bonded,	railroad securities, 172, 203, 233,
industrial corporations, 154-159	287
public utilities, 160-164, 230-231	reorganization, 233-234, 304, 305 ff.
railroads, 166, 172	telephone and telegraph service,
brokers, 227	493
failure, 292	Inventories,
industrial corporations, 154-159, 277	current capital, 241, 243
long-term, 154, 248	dividends, 271-272
payment through reinvested earn-	earnings, 127, 271-272
ings, 277	working capital, 119
public utilities, 160-164, 230-231	Investment affiliates, 178-179
refunding, 73-75, 277 (See also "Recapitalization"; "Reorgani-	118, 176, 177-178
zation")	charges, 199-201
short-term, 248-249	competitive bidding, 203-209
subsidiaries, 232, 319 Indentures, 86-87, 99 (See also	functions, 182-184
Indentures, 86-87, 99 (See also "Bonds")	interlocking directorships, 384
Indeterminate permits, 436-437	profits, 202 reorganization, 296-297
Industrial corporations,	syndicates, 184 ff.
bonds, 90	types of, 180-182
capital structure, 154-159	Investment Company Act, 235-238

LIFO method, 272 Light and power companies (See
"Public utilities")
Limited partnerships, 32-33, 36
Line of credit, 254, 257-258
Liquidation, 291, 295
advantages of, 55-56
stock claims, 105
preferred stock, 79-81
Loans,
agricultural, 139
commercial banks, 252-256, 257-258
dividend restrictions, 283
finance companies, 261-263
government, 263-264
holding companies, 238
intercompany, 229
investment companies, 238
mergers, 317
open market (commercial paper),
258-260
rescue, 234
small businesses, 139
trustees, 234
wholesale, 262
Loss leaders, 405
Mahaffie Act, 302
Management,
control by stockholders, 58-64
ownership and, separation, 33, 34,
36, 58-60, 69-70
shares, 81, 146
stockholding, 228
Management companies, 236
Mann-Elkins Act, 465
Market conditions,
corporate structure and, 126-127,
128, 130-132
dividends and, 278-279
investments and, 105-114, 130-132
"Market out" clauses, 196
Martin Law, 214
Massachusetts (business) trusts, 34-35
Mercantile Marine Act, 413
Mergers, 315-318, 381, 404 Meter rates, 474-475
Miller-Tydings Act, 405-406
Mining, 5, 271, 413-414
Monopolies (See also "Trusts")
causes, 418-423
devices for, 381-384
joint stock companies, 19, 21, 22
overcapitalization, 151
prices, 442-444
regulated companies, 19
regulation of, 416 ff.

524 INDEX

Monopolies—Continued	Paper,
size, 392, 396-397	commercial, 258-260
Mortgage bonds, 90-94	retail installment, 262
junior, 92, 93, 94, 166	two-name, 253, 256-257
purchase money, 93	Partnerships, 30-32
Motor Carrier Act, 412-413, 468	incorporated, 36
Municipal ownership and operation,	limited, 32-33
495, 501-506	associations, 36
	share-issuing (joint stock), 33
National Transportation Policy, 469	Par-value stock, 52, 82-85
Natural Gas Act, 493-494	issuance at less than par, 46, 52
Natural gas companies (See "Public	Patents, 128, 381
utilities")	Percentage system, rate making, 460
Net working capital, 242	Permits, indeterminate, 436-437
Nonbusiness corporations, 17, 18-19	Perpetual bonds, 88
Noncash dividends, 283-284	Philadelphia (lease) plan, 96-97
Noncorporate forms of organization,	Pools, 328, 386, 387, 439
business (Massachusetts) trusts,	railroads, 439, 466
34-35	Sherman Act, 389
importance, 5-7	state regulation, 387
joint stock associations, 33	Postal Fraud Law, 212
partnership, 30-32	Pre-emptive rights, 45, 57-58
limited, 32-33, 36	Preferred stock, 71-81
proprietorship, 28-30	banks, 174, 175
Noncumulative dividends, 75-78	capital structure and, 122-123, 157
Nonvoting common stock, 59, 65, 66,	161
132 Nonvoting preferred stock 72	cumulative, 73-75
Nonvoting preferred stock, 72 No-par stock, 44, 52, 82-85	debentures, 81 dividends, 73-78
overcapitalization, 148	evaluation as investments, 104-114
promoters' fees, 146	holding companies, 195
promoters rees, 140	income bonds vs., 102-103
Obsolescence and depreciation, 267-	industrial corporations, 154-159
271, 477-478	noncumulative, 75-78
Officers,	nonvoting, 72
investment trust, 237	operating companies, 195
liability of, 42, 216	participating, 78-79
powers and duties of, 41-42, 62	public utilities, 160, 161, 195
selfdealing, 235, 237	railroads, 166, 167
stockholding, 228, 230, 237	restrictions on management, 79
Open-market borrowing, 258-260	rights of in liquidation, 79-80
Open-market pricing, 409-411 Options, 146, 227, 238	underwriting commissions, 199-201
Options, 146, 227, 238	voting power, 45, 67, 232
bankers', 201-202	warrants, 78-79
Order bills of lading, 254	Prices (See also "Rates")
Overcapitalization,	agreements, 382-384, 386, 387
construction companies, 169-171	basing-point systems, 402, 404-405
evaluation of, 148-152	. 406-407, 408
promoters' profits, 142-144	bituminous coal, 413-414
railroads, 169-171, 172	capital requirements and, 243-244
watered stock, 147-148	competitive, 382-383
Over-the-counter markets, 228-229	concentration and, 369, 371, 372
Ownership,	375
dispersion of, and corporate con-	cutting, 382-383
trol, 132-133	fair-trade laws, 405-406
separation from management, 33, 34, 36, 58-60, 69-70	state legislation, 387
υτ, ιτι, ιστου _ι υστου	delivered, 404-405, 406-407

Dilara Continued	D 1 1 1 1 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2
Prices—Continued	Prudent investment principle, 269,
discrimination, 399	479, 483-486
monopolistic, 444-445	Public utilities,
public utilities, 422-423	bonds, 88, 90
earnings and, 126-127 fair, 447	collateral trust, 95
fixing,	mortgage, 90
Sherman Act, 388 ff.	capital structure, 159-164
unions, 395	original investment, 419 concentration, 356-357, 358-359
functional, 379, 447	construction companies, 171
leaders, 382, 383	costs and rates, 471 ff.
maintenance, resale, 387, 402, 404,	depreciation, 268-269
405-406	dividends (See also "Dividends")
manipulation, 227	property, 284-285
market conditions and, 105-114, 130-	stock, 285-286
132	electric companies (See "power in-
monopoly, 442-445	dustry")
open, 409-411	franchise, 433-437
overcapitalization, 149-151	holding companies (See "Holding
regulation of, 426, 430-431, 447 ff.	companies")
resale, maintenance, 387, 402, 404,	legal concept, 423-432
405-406	liability, 425
rights, 191-193	liquidation, 56
securities, 149, 158-159, 163, 286, 332	monopolistic tendencies, 418-423
	natural gas companies,
system, 379 upset, 298	capital structure, 164 regulation, 493-494
Production,	overcapitalization, 150-151
agreements, 382	peak load, 470-471
concentration and, 367, 371, 374-	power industry,
375	capital structure, 159-163
laissez-faire, 377-381	regulation of, 492-493
Profits,	preferred stock, 72-73
bondholders' participation, 104	rates (See "Rates")
expansion and, 327-330	regulation of, 286-289, 381, 492-
inventories, 271-272	494
investment banks, 202	reorganization, 232-233
monopoly prices, 442-445	taxation of, 440
overcapitalization, 141-152	telephone and telegraph,
participating stock, 78	capital structure, 159-160, 163-164
promoters', 142 ff.	regulation, 493
construction companies, 167-171	valuation of, 478 ff.
size and, 326 ff., 345 ff.	Public Utility Act, 163, 229-233, 235, 302, 492
stockholders' right to share, 54-55 taxation, 280-282	Public Utility Holding Company Act,
Promoters and promotion, 116 ff.,	189
141 ff.	Purchase money mortgage, 93
construction companies, 167-171	Purchase syndicates, 185
investment banks and banking (See	Pyramiding, 162-163, 320-321
"Investment banks and bank-	<u> </u>
ing")	Ouestan 392 397 390
promoters' shares, 81	Quotas, 382, 387, 389
selfdealing, 235, 237	
Property dividends, 284-285	Radio, regulation of, 493
Proprietorship, 28-30	Railroads,
Prospectuses, 142, 214, 216-218	antitrust legislation, 412-413
Proxies, 46, 60, 68, 228, 237, 318	bonds, 88, 90, 233-234

526 IND	EX
Railroads—Continued capital structure, 164-173 collateral trust bonds, 95 combination and consolidation, 165- 166, 412, 467 concentration, 356, 358 construction companies, 167-171 depreciation, 266, 268-269 dividends, 286-289 equipment trust obligations, 96-98, 166 franchises, 433, 435 guaranteed stocks and bonds, 81-82, 100-101 leases, 96-98, 166, 323-326 mortgage bonds, 90 junior, 94 overcapitalization, 150-151 pools, 466 public utility concept, 425, 426 rates (See "Rates"), 447-469 recapture, 466, 467 reorganization, 166, 172, 234, 304, 305, 307	Rates—Continued percentage basis, 460 port differentials, 459-460 public utilities, 421-423, 470 ff. franchise provisions, 435-436 regulation of, 437-442, 447 ff., 470 ff. types of, 474-477 publicity and comparison, 501-504 railroad, 173, 413 basing points, 382, 402, 404-405, 406-407, 408, 458 distance principle, 458-461, 462- 463, 467 regulation of, 438-440 447 ff., regulation of, 437-442, 447 ff., 470 ff. service, stimulation of use of, 457 values of, 456-457 T.V.A. vs. private utilities, 496-499 Wright (block), 476 Real (contract) theory of corporation, 12-13
Sherman Act, 389-390 valuation of, 478 ff. Railway Labor Act, 468 Rate agreements, 413	Recapitalization, 73-74, 292-294 Receivables, borrowing on, 255-256 factoring, 260-261
Rates. basing-point system, 382, 402, 404- 405, 406-407, 408, 458 blanket, 459-460 commodity classifications, 461, 462- 463	working capital, 119 Receivership, 91-92 collateral trust bonds, 95-96 equipment trust obligations, 96-97 equity, 295-300, 303-305, 310 receivers' certificates, 103-104, 296
cost factors, 435-436, 454-456, 457, 468, 470-474 discrimination, 459-460, 463-465,	Reconstruction Finance Corporation, 263 Records, examination of, 63-64
466 distance principle, 458-461, 462- 463, 466 Doherty (three part), 476-477 fair return, 150-151, 451, 453-454.	Reed-Bulwinkle Bill, 413, 462 Registered bonds, 89, 99 Regulated companies, 19 Regulation, banks, 173, 177-178
477 ff., 486-489 fixture, 474 flat, 474 franchise provisions. 435-436, 452-	brokers and dealers, 227-228, 229 commissions, regulatory, 437-442 alternatives, 495 ff. dividends, 282-283, 286-289
453 Hopkinson (two part), 476-477 interstate, 438-439, 452	federal, 214 ff., 387 ff., 492-494 (See also specific subject)
labor costs, 468 legal considerations, 450-453 meter, 474-476 minimum charges, 475-476	franchises, 433-437 installment credit companies, 262 investment banks and banking, 177 ff.
municipal ownership examples, 496- 499 ocean carriers, 413	investment companies (trusts), 235-238 joint stock companies, 33
overcapitalization, 150-151	judicial, 432-433

INL	1EA 54/
Regulation—Continued legislative, 433-437 methods of, 432-437 need for, 210-212, 506 ff. over-the-counter markets, 228-229 power industry, 492-494 public utilities, 286-289, 381, 492-494 proprietorship, 28, 31 publicity of rates, 501-504 radio broadcasting, 492-493 rates, 437-442, 447 ff., 470 ff. security sales, 178-180, 185, 189, 210 ff. specialists, 227-228 state legislation, 42-43, 212-214, 385, 386-387, 405-406, 438-441 telephone and telegraph services, 493 trends of, 491 ff. trustees, 234-235 trusts, 322-323, 377, 384 ff. "yardstick" power developments, 495-501 Reorganization, assumed bonds, 101-102 bankruptcy, 303-308 claims, priority, 299-303, 304, 308, 309 committees, 294, 296-298, 305 costs, 310 income bonds, 102-103 nonrailroad corporations, 307-308 preferred stock, 72, 166 public utilities, 308-309 railroads, 166, 172, 234, 304, 305-307 recapitalization, 73-74, 292-294 receivership (See "Receivership") trustees, 305, 310 Reproduction cost principle, 479, 480-486 Resale price maintenance, 387, 402, 404, 405-406 Reserves, 272-274 current capital, 249, 250-251 dividends, 272-274 insurance companies, 175 Restraint of trade, 377, 382, 384-386, 388 ff. Retail installment paper, 262 Retirement method, depreciation accounting, 267-268	Rights—Continued pre-emptive, 45, 57-58 privileged subscriptions, 190-191 value of, 57, 191-193 Robinson-Patman Act, 403, 408 "Rule of reason," 385, 391 ff. Salaries, 349-350 Scrip dividends, 283-284 Securities (See also "Bonds"; "Stocks") distribution, 181 ff. flotation costs of, 219-221 investment companies, 237 loans of, 227 mergers, 316-317 prospectuses, 142, 214, 216-218 registration statement of, 216, 219 reorganization, 304, 306-307 risky, suppression of, 223-225 Securities Act, 181, 200, 215 ff. Securities Exchange Act, 215, 227- 229 Securities and Exchange Commission, 142, 158, 199, 200 competitive bidding, 204-208 investment companies, 235-238 over-the-counter markets, 228-229 proxies, 60 public utilities, capital structure of, 160-161 holding companies, 195, 229-233, 492 registration statement, 216 ff. reorganization, 233, 234, 303, 307, 308-309 310 securities, suppression of risky, 223- 225 Selfdealing by investment trusts, 235, 237 Selling syndicates, 186-187, 210-211 Service-at-cost franchise, 435 Sherman Act, 377, 388 ff. Shipping Board Act, 413 Sinking fund, 267 Size, corporate, 7-9, 355 ff. antitrust legislation, 392-393, 396- 397, 407 expansion, 326-330, 336-338 business cycles, 331-335 consolidation and merger, 315- 318 holding companies, 318-321
counting, 267-268	holding companies, 318-321
Rights,	internal growth, 314-315
bonds, 104	leases, 323-326
charter qualifications, 45, 58	marginal principle, 335-336
conversion, 78-79	trusts, 321-323

•	
Size, corporate—Continued	Stock—Continued
labor and capital costs, 342-345	treasury, 70, 145
limits, 338-342	underwriting commissions, 199-201
monopoly 392 396-397	
monopoly, 392, 396-397 problems, 312-314	valuation, 145 voting (See "Voting")
problems, 512-514	voting (See Voting)
profits, 345-354	warrants, 78-79
Sliding-scale franchise, 435-436	watered, 147-148
Small businesses,	Stockholders,
bonded indebtedness, 155	claims, priority of, 299-303, 309
financing, 136-140	committees, 296, 305
profits, 345, 347 ff.	dividend expectations of, 54, 279-
Sovereignty (fiction) theory of cor-	280, 283
poration, 10-11, 12-15	liability of, 44, 70-71
Special offerings, 188	rights of, 45, 53-70
Specialists, regulation of, 227-228	Stockholding,
Step meter rate, 475	employees and customers, 193-195
Stock (See also "Securities")	
capital, 47, 51-53, 173-174	intercorporate, 400
	management, 228
structure and forms of, 122-123	officers, directors, owners, 228, 230,
"trust fund" theory, 82-84	237
certificates, 52-53	Stop orders, 142-143, 216, 223-225
common (See "Common stock")	Straight line method, depreciation ac-
competitive bidding for, 203-209	counting, 267, 268
control, monopolistic, 381	Straight meter rate, 474-475
conversion,	Strikes, 395-396
recapitalization, 73-74, 292-294	Subsidiaries,
rights, 78-79	bonds of, 95, 166
customer ownership, 193, 194-195	
debenture, 81	identity with parent, 13-14
deferred, 81	Surplus,
distribution, 132-133, 177 ff.	banks, 174
promoters, 141-146	dividends, 45, 274-275
	industrial corporations, 155
dividends, 285-286, 288 (See also	public utilities, 161, 162, 163-164,
"Dividends")	230
employee ownership, 193-194	railroads, 172
evaluation as investment, 104-114	Syndicates, 184 ff.
guaranteed, 81-82, 100-101	
intercorporate holding, 402, 403-404	Man
joint, 19-20	Taxation, 477
nonvoting, 59, 05, 66, 72, 132	business (Massachusetts) trust, 35
no-par value, 44, 52, 82-85	corporation, 29, 512-513
overcapitalization of, 148	state, 4/-48
promotion and, 146	dividends, 29, 103, 280-282, 286,
par value, 52, 82-85	349-350
issuance at less than par, 46, 52	earnings, 54, 280-282, 512-513
payment for 70 145-146	franchise, 47-48
payment for, 70, 145-146 preferred (See "Preferred stock")	holding companies, 319
prices, 149, 332 (See also "Prices")	income, 280-282
limidation EE EC	interest bonds 103
liquidation, 55-56	interest, bonds, 103
manipulation of, 227	joint stock company, 33
stock dividends, 286	partnership, 31
promoters of, 142 ff.	profits, 280-282
rights (See "Rights")	proprietorship, 29
sale of, 176 ff.	public utilities, 440, 497
special offerings of, 188	subsidiaries, 319
transferability of, 56-57	Telephone and telegraph (See "Pub-
trust shares, 321	lic utilities")
	•

Tennessee Valley Authority, 496-500, 502	Underwriting—Continued
Towns, in corporate development, 18	liability, 185-186, 187, 190, 216, 221- 222
Trade,	profits of, 143-144
acceptances, 253, 256-257	reorganization issues, 307
associations, 408-411	syndicates, 183, 184 ff.
agricultural, 412	Unions,
price control, 382	antitrust laws and, 381, 388-389,
credit, 251	395-396, 400-401
foreign, 411-412	de facto corporations, 14
acceptances, 256-257	Unit (fixed) trust, 236
restraint of, 377, 382, 384-386, 388 ff.	Unsecured bonds, 98-99
Transportation (See "Railroads")	Upset price, 298
Transportation Act, 233-234, 268,	Valuation Act, 465
412-413	Valuation reserves, 273
"True value" rule, 145	Voluntary associations, 23, 35
Trust, 321-323, 386	Voting, 66-68, 232
agreements, mortgage bonds, 91	bonds, 100, 104, 232
antitrust legislation, 322-323, 377,	common stock, 45, 82, 132-133
384 ff.	cumulative, 46, 67
exemptions, 388-389, 395-396,	limited, 66-67
411-414	multiple, 59
need for, 397-398, 506 ff.	preferred stock, 45, 232
business (Massachusetts), 34-35	proxies, 46, 60, 68, 228
share, 321	trust, 59-60, 132, 237, 307
unit (fixed), 236 voting, 59-60, 132, 237, 307	Warehouse receipts, 255
Trust Indenture Act, 234-235	Warrants, 78-79, 104
Trustees,.	bonds, 104
bankruptcy, 295, 310	promoters' fees, 146
business (Massachusetts) trust, 34	Washington (franchise) plan, 436
default, 91-92	Water Power Act, 493
liability of, 91, 234-235	Watered stock, 147-148
powers and duties of, 86-87, 91-92,	Webb-Pomerene Act, 411-412
99, 234-235	Wheeler-Lea Act, 402-403
receivers' certificates, 103-104	Working capital, 118-121, 241 ff.
reorganization, 305, 310	bonded indebtedness, 122, 161
voting trusts, 59	industrial corporations, 119-120
Two-name paper, 253, 256-257	inventories, 119
Ultra vires acts, 41, 43, 61, 64-65	net, 242 position of as affecting securities to
monopoly as, 322, 386	be issued, 134-135
Underwriting, 177 ff.	public utilities, 119, 121, 161
charges, 199-201	railroads, 121
investment banks, 177 ff.	recapitalization, 293-294
investment companies, 237	Wright (block) rates, 476